

=> d his

(FILE 'HOME' ENTERED AT 11:09:02 ON 28 JAN 2008)

FILE 'REGISTRY' ENTERED AT 11:09:11 ON 28 JAN 2008

L1 STRUCTURE UPLOADED

L2 50 S L1

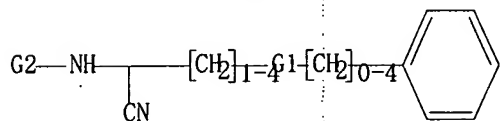
L3 1293 S L1 FULL

FILE 'CAPLUS' ENTERED AT 11:09:53 ON 28 JAN 2008

L4 82 S L3/P

=> d que 14 stat

L1 STR



G1 O, S, N

G2 H, Me, Et, n-Pr, i-Pr, n-Bu, i-Bu, CF<sub>3</sub>

Structure attributes must be viewed using STN Express query preparation.

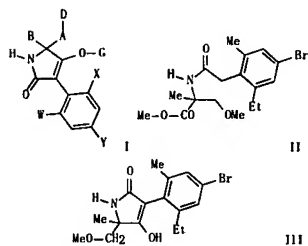
L3 1293 SEA FILE=REGISTRY SSS FUL L1

L4 82 SEA FILE=CAPLUS ABB=ON PLU=ON L3/P

=> d 1-82 ibib iabs hitstr

L4 ANSWER 1 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2007:1209253 CAPLUS :  
 DOCUMENT NUMBER: 147:486321  
 TITLE: Preparation of cycloalkylphenylcyclic ketoenols as herbicides  
 INVENTOR(S): Fischer, Reiner; Lehr, Stefan; Feucht, Dieter; Malsam, Olga; Hill, Martin Jeffrey; Kehne, Heinz; Rosinger, Christopher Hugh  
 PATENT ASSIGNEE(S): Bayer Cropscience AG, Germany  
 SOURCE: Ger. Offen., 85pp.  
 CODEN: GWXXBX  
 DOCUMENT TYPE: Patent  
 LANGUAGE: German  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

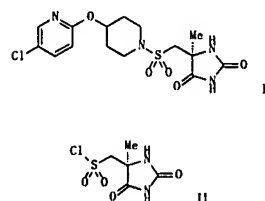
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 102006018828	A1	20071025	DE 2006-102006018828	20060422
WO 2007121868	A1	20071101	WO 2007-EP3245	20070412
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, SV, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW				
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, MT, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, CA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
PRIORITY APPLN. INFO.: DE 2006-102006018828A 20060422				
OTHER SOURCE(S): MARPAT 147:486321				
GRAPHIC IMAGE:				



ABSTRACT:

L4 ANSWER 2 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2007:1064273 CAPLUS :  
 DOCUMENT NUMBER: 147:385987  
 TITLE: Preparation of (SS)-5-[4-(5-chloro-pyridin-2-yl)oxy]-piperidine-1-sulfonylmethyl]-5-methyl-imidazolidine-2,4-dione as a metalloproteinase inhibitor and its crystal modifications  
 INVENTOR(S): Barnwell, Neil; Briggner, Lars-Erik; Cole, Andrea; Eriksson, Anders; Perkins, Jacob; Vaz, Luis-Manuel; Wells, Andrew  
 PATENT ASSIGNEE(S): AstraZeneca AB, Swed.  
 SOURCE: PCT Int. Appl., 85pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2007106022	A2	20070920	WO 2007-SE256	20070315
WO 2007106022	A3	20071101		
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, SV, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW				
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, MT, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, CA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AP, EA, EP, OA				
PRIORITY APPLN. INFO.: US 2006-782979P P 20060316				
GRAPHIC IMAGE:				

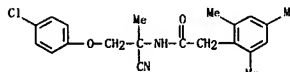


ABSTRACT:

The invention relates to (SS)-5-[4-(5-chloro-pyridin-2-yl)oxy]-piperidine-1-sulfonylmethyl]-5-methyl-imidazolidine-2,4-dione (I) and its crystal forms, processes for preparing them, pharmaceutical preps. comprising them, and their pharmaceutical use. I is a potent metalloproteinase inhibitor, particularly a potent inhibitor of MMP12, useful in the treatment of, e.g., COPD. For instance, I was prepared by reaction of compound II with 5-chloro-2-(piperidin-4-

L4 ANSWER 1 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 Title compds. I [W = H, alkyl, alkenyl, etc.; X = halo, alkyl, alkenyl, etc.; Y = H, alkyl, alkenyl, etc.; A = alkylidendiyl (sic); B = H, alkyl, alkoxyalkyl; D = alkoxy, alkenyloxy, alkynyloxy, etc.; G = H, COR1, SO2R3, etc.; R1 = alkyl, alkyl, alkenyl, etc.; R3 = alkyl, alkoxy, alkylamine, etc.] were prepd. For example, t-BuOK mediated condensation/cyclization of ket ester II afforded cyclic ketoenol III in 61% yield. In setaria viridis protection assays, 19-examples of compds. I after 3-wk exhibited >80% protection at 320 g/h.

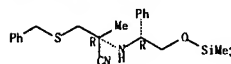
IT 736172-89-7P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of cycloalkylphenylcyclic ketoenols as herbicides)  
 RN 736172-89-7 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2,4,6-trimethyl- (CA INDEX NAME)



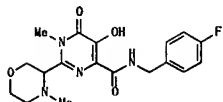
L4 ANSWER 2 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 5-oxypyridine (71%).

IT 950672-62-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of (SS)-5-[4-(5-chloro-pyridin-2-yl)oxy]piperidine-1-sulfonylmethyl]-5-methyl-imidazolidine-2,4-dione as a metalloproteinase inhibitor)  
 RN 950672-62-5 CAPLUS  
 CN Propanenitrile, 2-methyl-3-[(phenylmethyl)thio]-2-[[[(1R)-1-phenyl-2-[(trimethylsilyl)oxy]ethyl]amino]-, (2R)- (CA INDEX NAME)

Absolute stereochemistry.



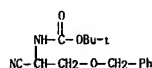
L4 ANSWER 3 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2007:1003188 CAPLUS  
 DOCUMENT NUMBER: 147:502303  
 TITLE: Discovery and Synthesis of HIV Integrase Inhibitors:  
 Development of Potent and Orally Bioavailable N-Methyl  
 Pyrimidones  
 AUTHOR(S): Gardelli, Cristina; Nizi, Emanuela; Muraglia, Ester;  
 Crescenzi, Benedetta; Ferrara, Marco; Orvieto,  
 Federico; Pao, Paola; Pescatore, Giovanna; Poma,  
 Marco; del Rosario Rico Ferreira, Maria; Scarpelli,  
 Rita; Homanick, Carl F.; Ikenoto, Norihiro; Alfieri,  
 Anna; Verdrame, Maria; Bonelli, Fabio; Gonzalez Paz,  
 Odalys; Taliani, Marina; Montegudo, Edith; Pesci,  
 Silvia; Laufer, Ralph; Felock, Peter; Stillmock, Kara  
 A.; Hazuda, Darin; Rowley, Michael; Summa, Vincenzo  
 CORPORATE SOURCE: Departments of Medicinal Chemistry and Pharmacology -  
 Istituto Di Ricerche Di Biologia Molecolare (IRBM-MRL  
 Rome), P. Angelotti S.p.A., Pomezia, 00040, Italy  
 SOURCE: Journal of Medicinal Chemistry (2007), 50(20),  
 4953-4975  
 CODEN: JMCMAR; ISSN: 0022-2623  
 PUBLISHER: American Chemical Society  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 147:502303  
 GRAPHIC IMAGE:



ABSTRACT:  
 The human immunodeficiency virus type-1 (HIV-1) encodes three enzymes essential for viral replication: a reverse transcriptase, a protease, and an integrase. The latter is responsible for the integration of the viral genome into the human genome and, therefore, represents an attractive target for chemotherapeutic intervention against AIDS. Benzyl-dihydroxypyrimidine-carboxamides were discovered in our labs. as a novel and metabolically stable class of agents that exhibits potent inhibition of the HIV integrase strand transfer step. Further efforts led to very potent compds. based on the structurally related N-Me pyrimidone scaffold. One of the more interesting compds. in this series is (4)-1, which shows a  $IC_{50}$  of 65 nM in the cell in the presence of serum. This compound has favorable pharmacokinetic properties in three preclin. species and shows no liabilities in several counterscreening assays.

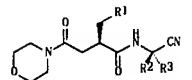
IT 911494-53-6P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (synthesis and biol. evaluation of (hydroxy)(carbamoyl)pyrimidinones as potent and orally bioavailable HIV integrase inhibitors)  
 RN 911494-53-6 CAPLUS  
 CN Carbamic acid, [1-cyano-2-(phenylmethoxy)ethyl]-, 1,1-dimethylethyl ester

L4 ANSWER 3 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 (SCI) (CA INDEX NAME)



REFERENCE COUNT: 48 THERE ARE 48 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 4 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2007:403452 CAPLUS  
 DOCUMENT NUMBER: 147:52764  
 TITLE: Identification of a novel class of  
 succinyl-nitrile-based Cathepsin S inhibitors  
 AUTHOR(S): Bekkali, Younes; Thomson, David S.; Betageri, Raji;  
 Emmanuel, Michel J.; Hao, Ming-Hong; Hickey, Eugene;  
 Liu, Weimin; Patel, Usha; Ward, Yancey D.; Young,  
 Erick R. R.; Nelson, Richard; Kukulka, Allison; Brown,  
 Maryanne L.; Crane, Kathy; White, Della; Freeman,  
 Dorothy M.; Labadia, Mark E.; Wildeson, Jessi; Spero,  
 Denise M.  
 CORPORATE SOURCE: Department of Medicinal Chemistry, Boehringer  
 Ingelheim Pharmaceuticals Inc., Ridgefield, CT,  
 06877-0368, USA  
 SOURCE: Bioorganic & Medicinal Chemistry Letters (2007),  
 17(9), 2465-2469  
 CODEN: BMCLER; ISSN: 0960-894X  
 PUBLISHER: Elsevier Ltd.  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 147:52764  
 GRAPHIC IMAGE:

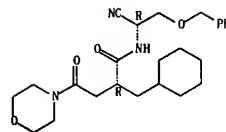


ABSTRACT:  
 The synthesis and in vitro activities of a series of succinyl-nitrile-based inhibitors of Cathepsin S 1 [R1 = cyclohexyl, 4-methylcyclohexyl, 2-indanyl, etc.; R2 = H, R3 = PhCH2CH2, PhCH2CH2, 4-ClCH2CH2CH2; R2R3 = CHCl2, (CH2)2N(cyclo-CR111)CH2, (CH2)2N(cyclo-CR111)CH2, etc.] are described. Several members of this class show nanomolar inhibition of the target enzyme as well as cellular potency. The inhibitors displaying the greatest potency contain N-alkyl-substituted piperidine and pyrrolidine rings spiro-fused to the  $\alpha$ -carbon of the P1 residue.

IT 324795-09-7P 939776-06-4P  
 RL: PAC (Pharmacological activity); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)  
 (preparation of succinamide-based nitrile-diamides including pyrrolidine and piperidine derivs. as cathepsin S inhibitors)  
 RN 324795-09-7 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]- $\alpha$ -(cyclohexylmethyl)- $\gamma$ -oxo-, (4R)- (CA INDEX NAME)

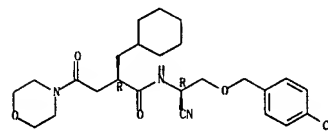
Absolute stereochemistry.

L4 ANSWER 4 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 939776-06-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1R)-2-[(4-chlorophenyl)methoxy]-1-cyanoethyl]- $\alpha$ -(cyclohexylmethyl)- $\gamma$ -oxo-, (4R)- (CA INDEX NAME)

Absolute stereochemistry.



REFERENCE COUNT: 20 THERE ARE 20 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

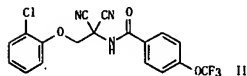
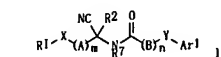
L4 ANSWER 5 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2007:174094 CAPLUS  
 DOCUMENT NUMBER: 146:251611  
 TITLE: Preparation of amidonitrile compounds as parasiticides  
 INVENTOR(S): Ducray, Pierre; Fruechtel, Joerg; Gauvry, Noelle;  
 Schorderet Weber, Sandra  
 PATENT ASSIGNEE(S): Novartis AG, Switz.; Novartis Pharma GmbH  
 SOURCE: PCT Int. Appl., 53pp.  
 CODEX: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2007017088	A1	20070215	WO 2006-EP7259	20060724

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LV, LY, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NG, NI, NO, NZ, OM, PA, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW

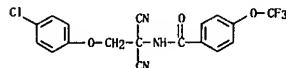
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

PRIORITY APPLN. INFO.: EP 2005-16071 A 20050725  
 OTHER SOURCE(S): MARPAT 146:251611  
 GRAPHIC IMAGE:



ABSTRACT:  
 Title Comps. Represented By The Formula I [Wherein R1 = H, alkyl, (un)substituted aryl, etc.; R2 = CN, CONR8R9 or CO2R8; A = CR3R4; B = CR5R6; R3-R9 = independently H, (cyclo)alkyl, alkenyl or alkynyl; Ar1 = (un)substituted (hetero)aryl; and their enantiomers or salts thereof] were prepared as parasiticides. For example, amidation of aminomalononitrile p-toluenesulfonate with 4-(trifluoromethoxy)benzoyl chloride, and followed by substitution with 1-chloro-2-chloromethoxybenzene gave II. II showed more than 80% control rate at 32 mg/kg p.o. on T. colubriformis and H. contortus. I have advantageous pesticidal properties for the control of parasites in and on warm-blooded animals.

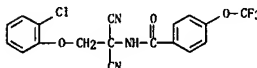
L4 ANSWER 5 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



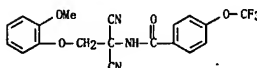
REFERENCE COUNT: 10 THERE ARE 10 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 5 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

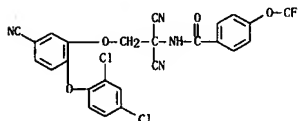
IT 925680-14-4P. N-[2-(2-chlorophenoxy)-1,1-dicyanoethyl]-4-(trifluoromethoxy)benzamide 925680-15-5P. N-[1,1-dicyano-2-(2-methoxyphenoxy)ethyl]-4-(trifluoromethoxy)benzamide 925680-16-6P. N-[1,1-dicyano-2-[5-cyano-2-(2,4-dichlorophenoxy)phenoxy]ethyl]-4-(trifluoromethoxy)benzamide 925680-17-7P. N-[2-(4-chlorophenoxy)-1,1-dicyanoethyl]-4-(trifluoromethoxy)benzamide  
 RL: AGP (Agricultural use); BSU (Biological study); PREP (Preparation); USES (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of amidonitrile comps. as parasiticides)  
 RN 925680-14-4 CAPLUS  
 CN Benzamide, N-[2-(2-chlorophenoxy)-1,1-dicyanoethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 925680-15-5 CAPLUS  
 CN Benzamide, N-[1,1-dicyano-2-(2-methoxyphenoxy)ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 925680-16-6 CAPLUS  
 CN Benzamide, N-[1,1-dicyano-2-[5-cyano-2-(2,4-dichlorophenoxy)phenoxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 925680-17-7 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1,1-dicyanoethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

L4 ANSWER 6 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

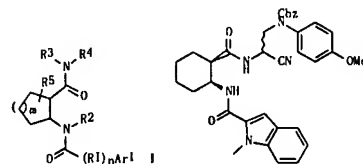
ACCESSION NUMBER: 2007:150949 CAPLUS  
 DOCUMENT NUMBER: 146:229179  
 TITLE: Preparation of (hetero)arylcarbonylaminocycloalkylcarbamides as cathepsin K inhibitors.  
 INVENTOR(S): Bamberg, Joe Timothy; Gabriel, Tobias  
 PATENT ASSIGNEE(S): F. Hoffmann-La Roche AG, Switz.  
 SOURCE: PCT Int. Appl., 58pp.  
 CODEX: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2007014839	A2	20070208	WO 2006-EP64306	20060717
WO 2007014839	A3	20070426		

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LV, LY, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NG, NI, NO, NZ, OM, PA, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW

RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AP, EA, EP, OA

US 2007032484 A1 20070208 US 2006-493208 20060725  
 PRIORITY APPLN. INFO.: MARPAT 146:229179 US 2005-702937P P 20050727  
 OTHER SOURCE(S):  
 GRAPHIC IMAGE:



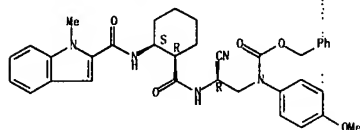
ABSTRACT:  
 Title compts. [I: m = 1-3; n = 0, 1; Ar1 = (bi)aryl, heteroaryl; R1 = alkyl, R2, R3, R5 = H, alkyl; R4 = aralkyl, cycloalkyl, heterocyclyl, heteroaralkyl, etc.], were prepared for treatment of osteoporosis, tumor metastasis, unstable angina, and plaque rupture (no data). Thus, title compound (II) was prepared in 81% yield as a separable mixture of isomers via coupling of the corresponding acid and amine in DMF using EDCI hydrochloride, NORT, and N-methylmorpholine.

IT 924298-88-4P 924298-89-5P  
 RL: PAC (Pharmacological activity); SPN (Synthetic preparation); TBU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)



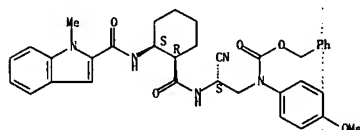
L4 ANSWER 6 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 (prepn. of (hetero)arylcarbonylaminocycloalkylcarboxamides as cathepsin  
 K inhibitors)  
 RN 924298-88-4 CAPLUS  
 CN Carbamic acid, N-[(2R)-2-cyano-2-[[[(1R,2S)-2-[[[(1-methyl-1H-indol-2-yl)carbonyl]amino]cyclohexyl]carbonyl]amino]ethyl]-N-(4-methoxyphenyl)-, phenylmethyl ester (CA INDEX NAME)

Absolute stereochemistry.

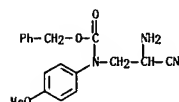


RN 924298-89-5 CAPLUS  
 CN Carbamic acid, N-[(2S)-2-cyano-2-[[[(1R,2S)-2-[[[(1-methyl-1H-indol-2-yl)carbonyl]amino]cyclohexyl]carbonyl]amino]ethyl]-N-(4-methoxyphenyl)-, phenylmethyl ester (CA INDEX NAME)

Absolute stereochemistry.

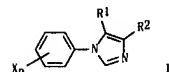


IT 924299-03-6P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT  
 (Reactant or reagent)  
 (preparation of (hetero)arylcarbonylaminocycloalkylcarboxamides as cathepsin  
 K inhibitors)  
 RN 924299-03-6 CAPLUS  
 CN Carbamic acid, N-(2-amino-2-cyanoethyl)-N-(4-methoxyphenyl)-, phenylmethyl ester (CA INDEX NAME)



L4 ANSWER 7 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2006:912437 CAPLUS  
 DOCUMENT NUMBER: 145:314991  
 TITLE: Preparation of 1-phenylimidazole derivatives as  
 herbicides  
 INVENTOR(S): Uchida, Aisushi; Yokota, Wakako; Hirai, Kenji;  
 Okamura, Mitsuyasu; Kondo, Satoru  
 PATENT ASSIGNEE(S): Sagami Chemical Research Center, Japan; Tosoh Corp.;  
 Hokko Chemical Industry Co., Ltd.  
 SOURCE: Jpn. Kokai Tokkyo Koho, 65pp.  
 CODEN: JXXXXF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2006232824	A	20060907	JP 2006-18326	20060127
PRIORITY APPLN. INFO:			JP 2005-19042	A 20050127
OTHER SOURCE(S):		MARPAT 145:314991		

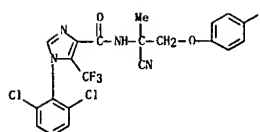


ABSTRACT:  
 The title compds., i.e. 1-phenylimidazole-4-carboxylic acid, 1-phenylimidazole-4-carboxamide, and 1-phenylimidazole-4-carbonitrile [1: R1 = Cl-6 fluoroalkyl; R2 = (un)substituted CO<sub>2</sub>H<sub>2</sub>, CO<sub>2</sub>H, cyano; X = H, halo, Cl-6 alkyl, Cl-6 haloalkyl, Cl-6 alkoxy, Cl-6 haloalkoxy, phenoxy, Cl-6 alkylthio, Cl-6 haloalkylthio, Cl-6 alkylsulfonyl, Cl-6 haloalkylsulfonyl, Cl-6 alkylsulfonyl, Cl-6 haloalkylsulfonyl, NH<sub>2</sub>, mono- or di(Cl-6 alkyl)amino, Cl-6 acylamino, Cl-6 alkylsulfonylamino, HO, SH, CO<sub>2</sub>H, cyano, NO<sub>2</sub>; n = an integer of 1-5; provided that when n is 2-5, X is same or different] are prepared. These compds. possess very potent controlling effect against harmful weeds in agricultural, horticultural, or nonagricultural fields. Thus, a solution of 1.0 g 1-(2,6-dichlorophenyl)-5-(trifluoromethyl)imidazole-4-carboxylic acid Et ester in 7 mL methanol was treated with 1 mL 40% aqueous methylamine solution and stirred at room temperature for 15 h to give 72.6% N-methyl-1-(2,6-dichlorophenyl)-5-(trifluoromethyl)imidazole-4-carboxamide (II). II at 1.2 kg/ha (preemergence) controlled 98% Echinochloa crus-galli, 80% Monochoria vaginalis, 85% Lindernia pyxidaria, and 20% Scirpus juncoides and gave no damage to rice seedlings.

IT 908605-37-8P, N-[1-cyano-1-methyl-2-(4-fluorophenoxy)ethyl]-1-(2,6-dichlorophenyl)-5-(trifluoromethyl)imidazole-4-carboxamide  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (herbicide which comprises imidazole derivs., manufacturing methods)  
 RN 908605-37-8 CAPLUS  
 CN 1H-imidazole-4-carboxamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-1-(2,6-dichlorophenyl)-5-(trifluoromethyl)- (CA INDEX NAME)

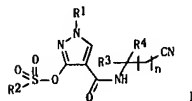
L4 ANSWER 6 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 7 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 8 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2006:763022 CAPLUS  
 DOCUMENT NUMBER: 145:211036  
 TITLE: Preparation of N-cyanoalkyl-3-(alkylsulfonyloxy)-1-H-pyrazole-4-carboxamides as insecticides and acaricides  
 INVENTOR(S): Kawauchi, Shinichiro; Yamada, Osamu; Tokumura, Jun; Ono, Ryuta; Nagasaka, Maho; Hirai, Kenji  
 PATENT ASSIGNEE(S): Kaken Pharmaceutical Co., Ltd., Japan; Sagami Chemical Research Center  
 SOURCE: Jpn. Kokai Tokkyo Koho, 24 pp.  
 CODEN: JKXXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

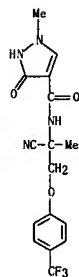
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2006199637	A	20060803	JP 2005-13968	20050121
PRIORITY APPLN. INFO.: OTHER SOURCE(S): GRAPHIC IMAGE:	MARPAT 145:211036		JP 2005-13968	20050121



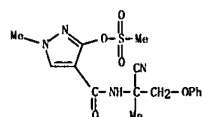
ABSTRACT:  
 insecticides or acaricides containing the title compds. [1: R1 = C1-12 alkyl; R2 = each (un)substituted C1-6 alkyl or Ph; R3, R4 = H, each (un)substituted C1-12 alkyl or C3-8 cycloalkyl; or R3 and R4 are bonded together to form C3-8 cycloalkyl; n = 0-5; R5 = H, C1-6 alkyl, halo] as the active ingredients are disclosed. These compds. show high activity against insects or mites resistant to existing agrochem. or horticultural insecticides or acaricides and are highly safe against beneficial organisms, scene. Thus, 3-ethoxycarbonyloxy-1-methylpyrazole-4-carboxamide Et carbonate was stirred with 2-amino-2-ethylbutanenitrile in MeCN at 0° for 30 min to give crude N-(1-cyano-1-ethylpropyl)-3-hydroxy-1-methylpyrazole-4-carboxamide which was stirred with methanesulfonyl chloride and K2CO3 in MeCN at 60° for 12 h to give 37.8% N-(1-cyano-1-ethylpropyl)-1-methyl-3-methylsulfonyloxy-pyrazole-4-carboxamide. N-(1-cyano-1-methylbutyl)-1-methyl-3-methylsulfonyloxy-pyrazole-4-carboxamide at 125 ppm controlled larva of Nephrotettix cincticeps on rice seedlings by 100%.

IT 904692-88-2P, N-[1-Cyano-1-methyl-2-(phenoxy)ethyl]-3-hydroxy-1-methylpyrazole-4-carboxamide 904692-89-3P, N-[1-Cyano-1-methyl-2-(4-fluorophenoxy)ethyl]-3-hydroxy-1-methylpyrazole-4-carboxamide 904692-90-6P, N-[1-Cyano-1-methyl-2-[(4-(trifluoromethyl)phenyl)oxy]ethyl]-3-hydroxy-1-methylpyrazole-4-carboxamide  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (intermediate: preparation of N-cyanoalkyl-3-(alkylsulfonyloxy)-1-H-pyrazole-4-carboxamides as insecticides and acaricides)

L4 ANSWER 8 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

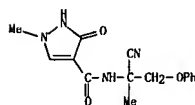


IT 904692-92-8P, N-[1-Cyano-1-methyl-2-(phenoxy)ethyl]-1-methyl-3-[(methylsulfonyl)oxy]pyrazole-4-carboxamide 904692-93-9P, N-[1-Cyano-1-methyl-2-(4-fluorophenoxy)ethyl]-1-methyl-3-[(methylsulfonyl)oxy]pyrazole-4-carboxamide 904692-94-0P, N-[1-Cyano-1-methyl-2-[(4-(trifluoromethyl)phenyl)oxy]ethyl]-1-methyl-3-[(methylsulfonyl)oxy]pyrazole-4-carboxamide  
 RL: AGR (Agricultural use); RSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of N-cyanoalkyl-3-(alkylsulfonyloxy)-1-H-pyrazole-4-carboxamides as insecticides and acaricides)  
 RN 904692-92-8 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-1-methyl-2-(phenoxyethyl)-1-methyl-3-[(methylsulfonyl)oxy]- (CA INDEX NAME)

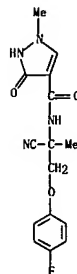


RN 904692-93-9 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-1-methyl-3-[(methylsulfonyl)oxy]- (CA INDEX NAME)

L4 ANSWER 8 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 RN 904692-88-2 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-1-methyl-2-phenoxyethyl]-2,3-dihydro-1-methyl-3-oxo- (CA INDEX NAME)

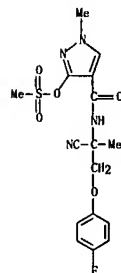


RN 904692-89-3 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-2,3-dihydro-1-methyl-3-oxo- (CA INDEX NAME)

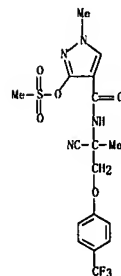


RN 904692-90-6 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-1-methyl-2-[(4-(trifluoromethyl)phenoxy)ethyl]-2,3-dihydro-1-methyl-3-oxo- (CA INDEX NAME)

L4 ANSWER 8 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

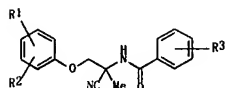


RN 904692-94-0 CAPLUS  
 CN 1H-Pyrazole-4-carboxamide, N-[1-cyano-1-methyl-2-[(4-(trifluoromethyl)phenoxy)ethyl]-1-methyl-3-[(methylsulfonyl)oxy]- (CA INDEX NAME)



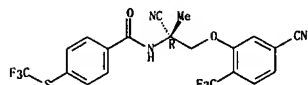
L4 ANSWER 9 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2006-469873 CAPLUS  
 DOCUMENT NUMBER: 144:488414  
 TITLE: Chromatographic resolution process for the preparation of enantiomers of benzamidoacetonitriles from their racemates using chiral chromatographic stationary phases  
 INVENTOR(S): Ducray, Pierre; Gauvry, Noelle; Goebel, Thomas; Pautrat, Francois  
 PATENT ASSIGNEE(S): Novartis AG, Switz.; Novartis Pharma GmbH  
 SOURCE: PCT Int. Appl., 19 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2006050887	A1	20060518	WO 2005-EP11894	20051107
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, GU, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, LY, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SH, SI, SM, SN, SV, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
AU 2005303993	A1	20060518	AU 2005-303993	20051107
CA 2580247	A1	20060518	CA 2005-2580247	20051107
EP 1812385	A1	20070801	EP 2005-803815	20051107
R: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR				
CN 101056849	A	20071017	CN 2005-80038355	20051107
IN 2007D02205	A	20070803	IN 2007-DN2205	20070321
KR 2007084061	A	20070824	KR 2007-710431	20070508
PRIORITY APPLN. INFO.:			EP 2004-26510	A 20041109
OTHER SOURCE(S):			WO 2005-EP11894	W 20051107
GRAPHIC IMAGE:				



ABSTRACT:  
 Pure enantiomers of benzamidoacetonitriles [1; R1-R3 = hydrogen, halogen, nitro, cyano, (un)substituted alkyl, (un)substituted alkoxy, (un)substituted alkenyl, (un)substituted alkynyl, (un)substituted alkenyloxy, (un)substituted alkylthio, (un)substituted alkylsulfonyloxy, (un)substituted alkylsulfinyl,

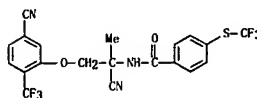
L4 ANSWER 9 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



REFERENCE COUNT: 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

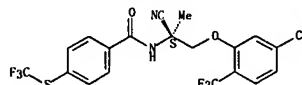
L4 ANSWER 9 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 etc.: e.g., (-)-(S)-N-[(1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl)-4-(trifluoromethylsulfonyl)benzamide] are prep. by the chromatog. of alc. solns. (e.g., MeOH-EtOH mixts.) of the 1 racemates (e.g., N-[(1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl)-4-(trifluoromethylsulfonyl)benzamide] using chiral chromatog. stationary phases (e.g., Chiralpak polysaccharide), followed by the epimerization of the unwanted enantiomer [e.g., (-)-(R)-N-[(1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl)-4-(trifluoromethylsulfonyl)benzamide] into the 1 racemate by heating an aq. 1,4-dioxane soln. of it with NaCN, followed by chromatog. re-resoln.

IT 851976-50-6P  
 RL: PEP (Physical, engineering or chemical process); PYP (Physical process); SPN (Synthetic preparation); PREP (Preparation); PRDC (Process) (chromatog. resolution process for the preparation of enantiomers of benzamidoacetonitriles from their racemates using chiral chromatog.)  
 RN 851976-50-6 CAPLUS  
 CN Benzamide, N-[(1S)-1-cyano-2-[5-cyano-2-(trifluoromethyl)phenoxy]-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)



IT 887148-69-8P  
 RL: PUR (Purification or recovery); PREP (Preparation) (chromatog. resolution process for the preparation of enantiomers of benzamidoacetonitriles from their racemates using chiral chromatog.)  
 RN 887148-69-8 CAPLUS  
 CN Benzamide, N-[(1S)-1-cyano-2-[5-cyano-2-(trifluoromethyl)phenoxy]-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).



IT 887148-70-1P  
 RL: PUR (Purification or recovery); RCT (Reactant); PREP (Preparation); RACT (Reactant or reagent) (resolution and epimerization of)  
 RN 887148-70-1 CAPLUS  
 CN Benzamide, N-[(1R)-1-cyano-2-[5-cyano-2-(trifluoromethyl)phenoxy]-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

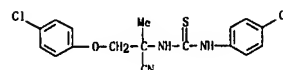
Absolute stereochemistry. Rotation (+).

L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2006-380908 CAPLUS  
 DOCUMENT NUMBER: 144:432561  
 TITLE: Preparation of acetonitrile moiety-containing phenylacetamides and benzamides as pest control agents and methods of using them  
 INVENTOR(S): Andoh, Nobuharu; Sanpei, Osamu; Sakata, Kazuyuki  
 PATENT ASSIGNEE(S): Nihon Nohyaku Co., Ltd., Japan  
 SOURCE: PCT Int. Appl., 148 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2006043654	A1	20060427	WO 2005-JP19375	20051021
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, GU, HU, ID, IL, IN, IS, KE, KG, KM, KN, KP, KR, KZ, LC, LX, LR, LS, LT, LU, LV, LY, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SM, SN, SV, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, LV, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG, BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
JP 2006117603	A	20060511	JP 2004-308668	20041022
JP 2006117604	A	20060511	JP 2004-308673	20041022
JP 2006117605	A	20060511	JP 2004-308675	20041022
PRIORITY APPLN. INFO.:			JP 2004-308668	A 20041022
			JP 2004-308673	A 20041022
			JP 2004-308675	A 20041022

OTHER SOURCE(S): MARPAT 144:432561  
 ABSTRACT:  
 The title compds. AC(CN) (R)R [A = Q1CONR1, etc.; Q1 = (un)substituted Ph, etc.; R1 = H, alkyl, haloalkyl, etc.; B = C(R3) (R4)WR5, etc.; R3, R4 = H, alkyl, haloalkyl, etc.; R5 = alkyl, haloalkyl, cycloalkyl, etc.; W = O, S, SO, etc.; R = H, alkyl, haloalkyl, cycloalkyl, etc.] are prepared. Methods of using the title compds. are also claimed. Thus, N-[(1-cyano-1-methyl-2-octylthioethyl)-4-chlorophenyl]acetamide was prepared in 3 steps from chloroacetone and 1-octanethiol. Compds. of this invention at 1000 ppm gave  $\geq 90\%$  to 99% kill of Spodoptera litura.

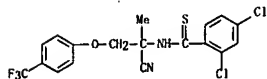
IT 885026-12-0P 885026-13-1P  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); RCT (Reactant); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses) (preparation of acetonitrile moiety-containing phenylacetamides and benzamides as pest control agents)  
 RN 885026-12-0 CAPLUS  
 CN Thiourea, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)- (CA INDEX NAME)



L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

RN 885026-13-1 CAPLUS

CN Benzenecarbothioamide, 2,4-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



IT 885027-47-4P 885027-49-6P 885027-51-0P

885027-53-2P 885027-55-4P 885027-57-6P

885027-59-8P 885027-61-2P 885027-63-4P

885027-65-6P 885027-67-8P 885027-69-0P

885027-71-4P 885027-76-9P 885027-78-1P

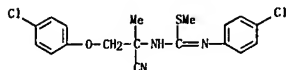
RL: AGR (Agricultural use); RSU (Biological study, unclassified); SPN

(Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES

(Uses) (preparation of acetonitrile moiety-containing phenylacetamides and benzamides as pest control agents)

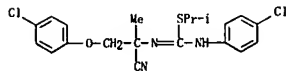
RN 885027-47-4 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, methyl ester (CA INDEX NAME)



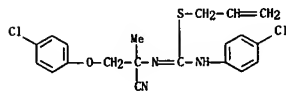
RN 885027-49-6 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, 1-methylethyl ester (CA INDEX NAME)

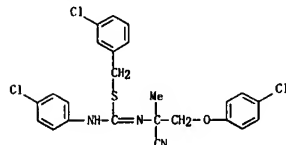


RN 885027-51-0 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, 2-propenyl ester (9C1) (CA INDEX NAME)

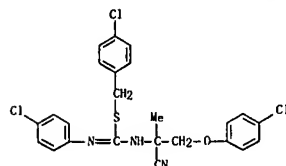


L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



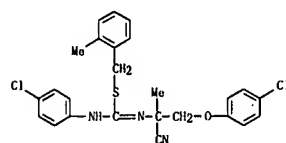
RN 885027-61-2 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, (4-chlorophenyl)methyl ester (CA INDEX NAME)



RN 885027-63-4 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, (2-methylphenyl)methyl ester (CA INDEX NAME)



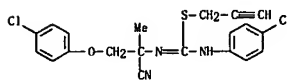
RN 885027-65-6 CAPLUS

CN Acetic acid, [[[[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]amino] [(4-chlorophenyl)imino]methyl]thio]-, methyl ester (9C1) (CA INDEX NAME)

L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

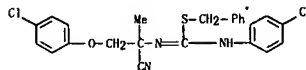
RN 885027-53-2 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, 2-propenyl ester (9C1) (CA INDEX NAME)



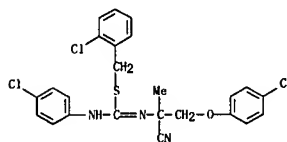
RN 885027-55-4 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, phenylmethyl ester (CA INDEX NAME)



RN 885027-57-6 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, (2-chlorophenyl)methyl ester (CA INDEX NAME)

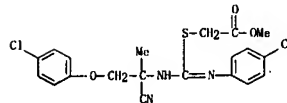


RN 885027-59-8 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, (3-chlorophenyl)methyl ester (CA INDEX NAME)

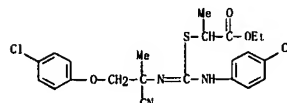


L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



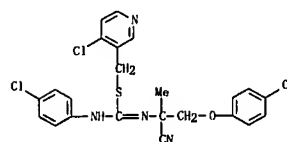
RN 885027-67-8 CAPLUS

CN Propanoic acid, 2-[[[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]amino] [(4-chlorophenyl)imino]methyl]thio]-, ethyl ester (9C1) (CA INDEX NAME)



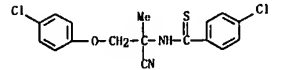
RN 885027-69-0 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, (4-chloro-3-pyridinyl)methyl ester (CA INDEX NAME)



RN 885027-71-4 CAPLUS

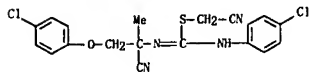
CN Benzenecarbothioamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



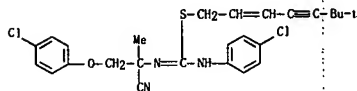
RN 885027-76-9 CAPLUS

CN Carbamidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, cyanomethyl ester (CA INDEX NAME)

L4 ANSWER 10 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 885027-78-1 CAPLUS  
CN Carbamimidothioic acid, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-N'-(4-chlorophenyl)-, 6,6-dimethyl-2-hepten-4-ynyl ester (9CI) (CA INDEX (NAME))



REFERENCE COUNT: 19 THERE ARE 19 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 11 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2006:274326 CAPLUS  
DOCUMENT NUMBER: 144:468439  
TITLE: Dipeptide nitrile inhibitors of cathepsin K  
AUTHOR(S): Allmann, Eva; Aichehl, Reiner; Betschert, Claudia;  
Buhl, Thomas; Green, Jonathan; Lettmann, Rene;  
Missbach, Martin  
CORPORATE SOURCE: Novartis Institutes for Biomedical Research, Basel,

CORPORATE SOURCE: Novartis Institutes for BioMedical Research, Basel, CH-4002, Switz.  
SOURCE: Biorganic & Medicinal Chemistry Letters (2006), 16(9), 2549-2554  
CODEN: BMCLER ISSN: 0960-894X

PUBLISHER: Elsevier B.V.

DOCUMENT TYPE: Journal  
LANGUAGE: English  
OTHER SOURCE(S): CASREACT 144:468439

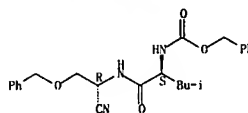
**ABSTRACT:** A series of dipeptidyl nitriles as inhibitors of cathepsin K have been explored starting from lead structure Cbz-Leu-NHCH<sub>2</sub>CH<sub>2</sub>NCN (IC<sub>50</sub> = 39 nM). Attachment of non-natural amino acid side chains in P1 and modification of the P3 subunit led to inhibitors with higher potency and improved pharmacokinetic properties.

IT 225118-92-3P 225119-40-4P 886758-73-2P

RL: PAC (Pharmacological activity); PKT (Pharmacokinetics); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)  
(preparation of dipeptide nitrile inhibitors of cathepsin K)

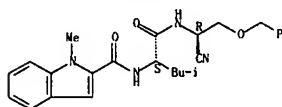
RN	225118-92-3	CAPLUS
CN	Carbamic acid, [(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbon- yl]-3-methylbutyl]-, phenylmethyl ester (9CI) (CA INDEX NAME)	

### Absolute stereochemistry.



RN 225119-40-4 CAPLUS  
CN 1H-Indole-2-carboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-1-methyl- (9CI) (CA INDEX NAME)

### Absolute stereochemistry.

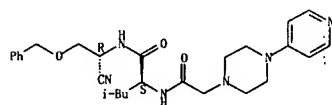


RN 886758-73-2 CAPLUS

L4 ANSWER 11 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

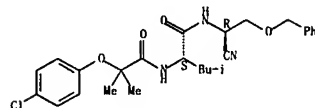
1-Piperazineacetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-4-(4-pyridinyl)- (9CI)  
(CA INDEX NAME)

### Absolute stereochemistry.



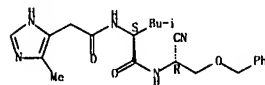
RN 886758-74-3 CAPLUS  
CN Pentanamide, 2-[[2-(4-chlorophenoxy)-2-methyl-1-oxopropyl]amino]-N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-4-methyl-, (2S)- (CA INDEX NAME)

### Absolute stereochemistry.



RN 886758-76-5 CAPLUS  
CN 1H-imidazole-4-acetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-5-methyl- (9CI) (CA INDEX NAME)

### Absolute stereochemistry.

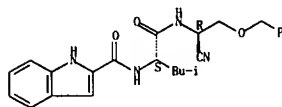


IT 225119-39-1P 886758-72-1P 886758-75-4P  
886758-77-6P  
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); BIOL  
(Biological study); PREP (Preparation)  
(preparation of dipeptide nitrile inhibitors of cathepsin K)

225119-39-1 CAPLUS  
1H-Indolo-2-carboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (9CI) (CA INDEX NAME)

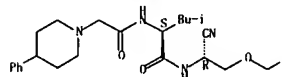
### Absolute stereochemistry.

14 ANSWER 11 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



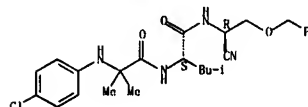
RN 886758-72-1 CAPLUS  
CN 1-Piperidineacetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-  
(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-4-phenyl)- (9CI) (CA  
INDEX NAME)

### Absolute stereochemistry.



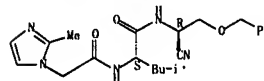
RN 886758-75-4 CAPLUS  
CN L-Leucinamide, N-(4-chlorophenyl)-2-methylalanyl-N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]- (9CI) (CA INDEX NAME)

### Absolute stereochemistry.



RN 886758-77-6 CAPLUS  
CN 11-Imidazole-1-acetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-2-methyl- (9CI) (CA INDEX NAME)

### Absolute stereochemistry.

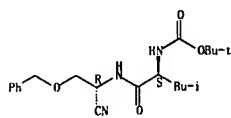


IT 886758-92-5P 886758-93-6P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)

RN 886758-92-5 CAPLUS  
 CN Carboic acid, [(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbon  
 yl]-3-methylbutyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

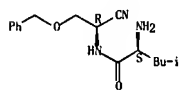
L4 ANSWER 11 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



RN 886758-93-6 CAPLUS  
 CN Pentanamide, 2-amino-N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-4-methyl-, (2S)- (CA INDEX NAME)

Absolute stereochemistry.

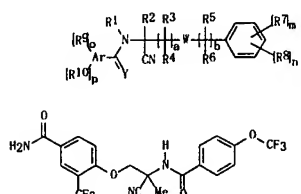


REFERENCE COUNT: 10 THERE ARE 10 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 12 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2005:131229 CAPLUS  
 DOCUMENT NUMBER: 144:69626  
 TITLE: Preparation of aminoacetonitrile derivatives for controlling parasites on warm-blooded animals  
 INVENTOR(S): Guevry, Noelle; Ducray, Pierre; Goebel, Thomas; Kaminsky, Ronald  
 PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis Pharma G.m.b.H.  
 SOURCE: PCT Int. Appl., 95 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005121075	A1	20051222	WO 2005-EP6207	20050609
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, NA, NG, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: BF, BI, BM, KE, LS, MW, NZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, BG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RD, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
AU 2005251917	A1	20051222	AU 2005-251917	20050609
EP 1758849	A1	20070307	EP 2005-751761	20050609
R: AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LI, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR				
JP 200801761	T	20080124	JP 2007-526305	20050609
PRIORITY APPL. INFO:			EP 2004-13690	A 20040610
			WO 2005-EP6207	W 20050609
OTHER SOURCE(S):			CASREACT 144:69626	MARPAT 144:69626
GRAPHIC IMAGE:				



L4 ANSWER 12 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

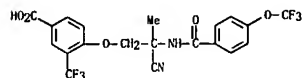
ABSTRACT:

The title compds. I (Ar = (un)substituted (hetero)aryl; R1 = H, alkyl, haloalkyl, etc.; R2-R6 = H, halo, (un)substituted alkyl, etc.; or R2 and R3 are together alkylene; R7, R10 = NH2, OH, SH, etc.; R8 = halo, NO2, CN, etc.; R9 = halo, NO2, CN, etc.; a = 1-4; b = 0-4; m, n, o, p = 0-5; W = O, S, SO2, etc.; Y = O, S, NR11 (R11 = alkyl, (un)substituted Ph); with the proviso that m and p are not equal to 0 at the same time) which have advantageous pesticidal properties and are particularly suitable for controlling parasites in warm-blooded animals, were prepared and formulated. E.g., a multi-step synthesis of II, starting from 4-fluoro-3-trifluoromethylbenzonitrile, was given. Compound II reduced the number of nematode worms by more than 95% in in vivo test against *Trichostrongylus colubriformis* and *Haemonchus contortus* in Mongolian gerbils by peroral administration.

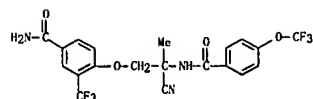
IT 871795-81-2P 871795-83-4P 871795-85-6P  
 871795-87-8P 871795-89-0P

RL: AGR (Agricultural use); BSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); B10L (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of aminoacetonitrile derivs. for controlling parasites on warm-blooded animals)

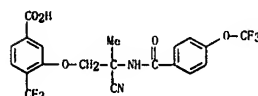
RN 871795-81-2 CAPLUS  
 CN Benzoic acid, 4-[2-cyano-2-[[4-(trifluoromethoxy)benzoyl]amino]propoxy]-3-(trifluoromethyl)- (CA INDEX NAME)



RN 871795-83-4 CAPLUS  
 CN Benzamide, 4-[2-cyano-2-[[4-(trifluoromethoxy)benzoyl]amino]propoxy]-3-(trifluoromethyl)- (CA INDEX NAME)



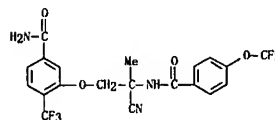
RN 871795-85-6 CAPLUS  
 CN Benzoic acid, 3-[2-cyano-2-[[4-(trifluoromethoxy)benzoyl]amino]propoxy]-4-(trifluoromethyl)- (CA INDEX NAME)



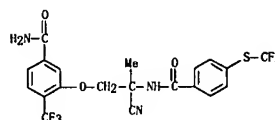
RN 871795-87-8 CAPLUS  
 CN Benzamide, 3-[2-cyano-2-[[4-(trifluoromethoxy)benzoyl]amino]propoxy]-4-(trifluoromethyl)- (CA INDEX NAME)

L4 ANSWER 12 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

(trifluoromethyl)- (CA INDEX NAME)

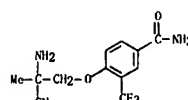


RN 871795-89-0 CAPLUS  
 CN Benzamide, 3-[2-cyano-2-[[4-(trifluoromethylthio)benzoyl]amino]propoxy]-4-(trifluoromethyl)- (CA INDEX NAME)



IT 871795-97-0P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of aminoacetonitrile derivs. for controlling parasites on warm-blooded animals)

RN 871795-97-0 CAPLUS  
 CN Benzamide, 4-[2-amino-2-cyanopropoxy]-3-(trifluoromethyl)- (CA INDEX NAME)



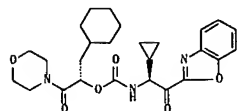
REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

## L4 ANSWER 13 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2005:1220334 CAPLUS  
 DOCUMENT NUMBER: 143:478201  
 TITLE: Preparation of amino acid derivatives as cathepsin S inhibitors  
 INVENTOR(S): Liu, Hong; Tully, David C.; Chatterjee, Arnab; Alper, Phillip B.; Woodmansee, David H.; Mutnick, Daniel  
 PATENT ASSIGNEE(S): IRM LLC, Bermuda  
 SOURCE: PCT Int. Appl., 61 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005107464	A2	20051117	WO 2005-US15117	20050429
WO 2005107464	A3	20060608		
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KP, KR, KZ, LC, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW			
RW:	BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
AU 2005240094	A1	20051117	AU 2005-240094	20050429
CA 2563975	A1	20051117	CA 2005-2563975	20050429
EP 1744755	A2	20070124	EP 2005-742278	20050429
R:	AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR			
CN 1976710	A	20070606	CN 2005-80021967	20050429
BR 2005010503	A	20071030	BR 2005-10503	20050429
JP 2007535568	T	20071206	JP 2007-511076	20050429
IN 2006DN06304	A	20070831	IN 2006-DN6304	20061026
US 2007232606	A1	20071004	US 2006-568459	20061129
KR 2007027570	A	20070309	KR 2006-725302	20061130
PRIORITY APPLN. INFO.:			US 2004-566990P	P 20040430
OTHER SOURCE(S):	MARPAT 143:478201		WO 2005-US15117	W 20050429

GRAPHIC IMAGE:



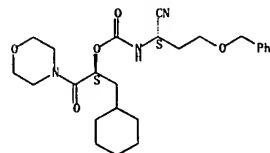
## ABSTRACT:

The invention provides compds. R1R2NCO2CR3R4COR5 [R1 is CR6R7COR8, CR6R7CN or

## L4 ANSWER 13 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

INDEX NAME)

Absolute stereochemistry.



## L4 ANSWER 13 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

substituted 4-oxotetrahydrofuran-3-yl [R6 and R7 are independently H, (un)substituted alkyl, cyanoalkyl, cycloalkylalkyl or arylalkyl or R6R7N is heterocycloalkyl or cycloalkyl; any alkyl of R6 and R7 can have a methylene replaced with O, S, SO or SO2; R8 is H or (un)substituted arylalkyl, heteroarylalkyl, carboxy or alkyl ester or carboxamide]; R2 is H or alkyl; R3, R4 are independently H, (un)substituted alkyl, cycloalkylalkyl or arylalkyl, where any alkyl of R3 and R4 can have a methylene replaced with O, S, SO or SO2; R5 is (un)substituted heterocycloalkyl or an amino group] and pharmaceutical compns. comprising these compds. for treating or preventing diseases or disorders assocd. with the activity of cathepsin S. Thus, amino acid deriv. 1, prepd. by a multistep sequence, has an IC50 of 6.6 nM and is at least 100 fold selective for cathepsin S over cathepsins K, B and L.

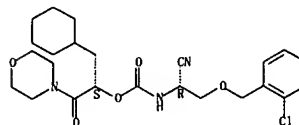
IT 869502-45-4P 869502-67-OP 869502-68-IP  
 RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(Preparation of amino acid derivs. as cathepsin S inhibitors)

RN 869502-45-4 CAPLUS

CN Carbanic acid, [(1R)-2-[(2-chlorophenyl)methoxy]-1-cyanoethyl]-, (1S)-1-(cyclohexylmethyl)-2-(4-morpholinyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)

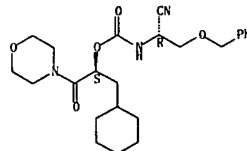
Absolute stereochemistry.



RN 869502-67-0 CAPLUS

CN Carbanic acid, [(1R)-1-cyano-2-(phenylmethoxy)ethyl]-, (1S)-1-(cyclohexylmethyl)-2-(4-morpholinyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 869502-68-1 CAPLUS

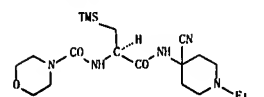
CN Carbanic acid, [(1S)-1-cyano-3-(phenylmethoxy)propyl]-, (1S)-1-(cyclohexylmethyl)-2-(4-morpholinyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)

## L4 ANSWER 14 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2005:811667 CAPLUS  
 DOCUMENT NUMBER: 143:229992  
 TITLE: Preparation of silyl-containing carboxamides as cysteine protease inhibitors  
 INVENTOR(S): Link, John O.; Graupe, Michael  
 PATENT ASSIGNEE(S): Axxis Pharmaceuticals, Inc., USA  
 SOURCE: PCT Int. Appl., 93 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005074904	A2	20050818	WO 2005-US2773	20050131
WO 2005074904	A3	20050929		
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW			
RW:	BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
AU 2005210631	A1	20050818	AU 2005-210631	20050131
CA 2554626	A1	20050818	CA 2005-2554626	20050131
EP 1716158	A2	20061102	EP 2005-722609	20050131
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MX, CY, AL, TR, BG, CZ, EE, HU, PL, SK, BA, HR, IS, YU			
BR 2005006494	A	20070213	BR 2005-6494	20050131
CN 1938323	A	20070328	CN 2005-60010399	20050131
JP 2007519744	T	20070719	JP 2006-551515	20050131
MX 2006PA08543	A	20061211	MX 2006-PA8543	20060728
IN 2006DN04367	A	20070810	IN 2006-DN4367	20060728
NO 2006003842	A	20061020	NO 2006-3842	20060829
US 2007088901	A1	20070419	US 2006-587867	20061221
PRIORITY APPLN. INFO.:			US 2004-540581P	P 20040130
OTHER SOURCE(S):	MARPAT 143:229992		WO 2005-US2773	W 20050131

GRAPHIC IMAGE:

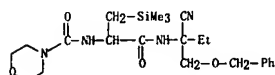


## ABSTRACT:

The present invention is directed to silyl-containing carboxamides (R3-Q-N(R2)-C(R1)(R1a)-C(O)-N(H)-E (I); variables defined below: e.g. morpholine-4-carboxylic acid [(1R)-1-[(4-cyano-1-methylpiperidin-4-yl)carbamoyl]-2-(trimethylsilyl)ethyl]amide (shown as 1)) that are inhibitors of cysteine proteases, in particular, cathepsins B, K, L, F, and S and are therefore useful

L4 ANSWER 14 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 in treating diseases mediated by these proteases. The present invention is also directed to pharmaceutical compns. comprising these compns. and processes for prep. them. The present invention is also directed to the use of these inhibitors in combination with a therapy that causes a deleterious immune response in patients receiving the therapy. Although the methods of prep. are not claimed, 11 example preps. of 1 are included. For example, 11 was prep. in 2 steps starting with amide formation between (R)-2-amino-3-((trimethylsilyl)propionyl)propionic acid and morpholinocarbonyl chloride using MSTFA to give 2-(R)-[[[(morpholin-4-yl)carbonyl]amino]-3-((trimethylsilyl)propionyl)propionic acid which underwent amide formation with 4-amino-4-cyano-1-ethylpiperidine hydrochloride in the presence of HATU and iPr2EtN in DMF. For 1: Q is -CO-, -SO2-, -OCO-, -NR4CO-, -NR4SO2-, or -CHRR- where R is haloalkyl and R4 is H, alkyl, hydroxyalkyl, alkoxyalkyl, or aralkyl; E is -C(R5)(R6)X1 (X1 is -C(R7)(R8)R10, -CH2CH2(O)2R10, -C(R7)(R8)C(R7)(R8)OR10, -C(R7)(R8)CH2OR10, -C(R7)(R8)CH2N(R11)SO2R10, -C(R7)(R8)C(O)N(R11)(CH2)2OR11, C(R7)(R8)C(O)NR10R11 or -C(R7)(R8)C(O)N(R11)(CH2)2NR10R11) or -C(R5a)(R6a)CN. R1 is H or alkyl; R1a is 1,1-dialkylsilyl-2-alkylalkene or -(alkylene)-SiR32R33R34 where R32 is alkyl, R33 is alkyl, and R34 is alkyl, alkenyl, cycloalkylalkyl, aryl, aralkyl, heteroalkyl, or heterocycloalkylalkyl or R33 and R34 together with Si1 form a heterocycloalkylene ring contg. the Si atom and 3 to 7 C ring atoms wherein one or two C ring atoms are optionally independently replaced with -NH-, -O-, -S-, -SO-, -SO2-, -CO-, -CONH-, or -SO2NH-. R2 is H or alkyl; R3 is alkyl, haloalkyl, cycloalkyl, cycloalkylalkyl, aryl, aralkyl, heteroaryl, heteroalkyl, heterocycloalkyl, heterocycloalkylalkyl, or -alkylene-X6-R35 [wherein X6 is -NR36-, -O-, -S(O)n4-, -CO-, -OCO-, -OCO-, -NR36CO-, -CONR36-, -NR36SO2-, -SO2NR36-, -NR36COO-, -OCONR36-, NR36CONR37- or NR36SO2NR37- (each R36 and R37 is H, alkyl, or acyl and n4 = 0-2) and R35 is H, alkyl, haloalkyl, cycloalkyl, cycloalkylalkyl, heterocycloalkyl, heterocycloalkylalkyl, aryl, alkyl, heteroaryl, or heteroalkyl]; addnl. details are given in the claims.

IT 862693-84-3P, Morpholine-4-carboxylic acid 1-[[1-(benzyloxyethyl)-1-cyanopropyl]carbamoyl]-2-(trimethylsilyl)ethyl]amide  
 862693-87-6P, Morpholine-4-carboxylic acid 1-[[2-(benzyloxy-1-cyano-1-methylethyl)carbamoyl]-2-(trimethylsilyl)ethyl]amide  
 RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (drug candidate: preparation of silyl-containing carboxamides as cysteine protease inhibitors)  
 RN 862693-84-3 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[2-[[1-cyano-1-[(phenylmethoxy)methyl]propyl]amino]-2-oxo-1-[(trimethylsilyl)methyl]ethyl]- (CA INDEX NAME)



RN 862693-87-6 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[2-[[1-cyano-1-methyl-2-(phenylmethoxy)ethyl]amino]-2-oxo-1-[(trimethylsilyl)methyl]ethyl]- (CA INDEX NAME)

L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2005:564630 CAPLUS  
 DOCUMENT NUMBER: 143:97169

TITLE: A preparation of N-(phenoxyethyl)benzamide derivatives, useful as insecticides  
 INVENTOR(S): Goebel, Thomas; Gauvry, Noelle; Ducray, Pierre  
 PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis Pharma G.m.b.H.  
 SOURCE: PCT Int. Appl., 47 pp.; CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

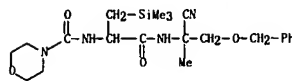
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005058802	A1	20050630	WO 2004-EP14046	20041209
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, MG, MW, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GW, GQ, ML, MR, NE, SN, TD, TG				
AU 2004299229	A1	20050630	AU 2004-299229	20041209
CA 2547542	A1	20050630	CA 2004-2547542	20041209
EP 1706373	A1	20061004	EP 2004-803700	20041209
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, IS				
CN 1890209	A	20070103	CN 2004-80036940	20041209
BR 2004017548	A	20070327	BR 2004-17548	20041209
JP 2007513911	T	20070531	JP 2006-543481	20041209
MX 2006PA06825	A	20060731	MX 2006-PA6625	20060609
US 2007037891	A1	20070215	US 2006-581463	20060717
PRIORITY APPL. INFO.:			EP 2003-28342	A 20031210
OTHER SOURCE(S):			WO 2004-EP14046	W 20041209
GRAPHIC IMAGE:			CASREACT 143:97169; MARPAT 143:97169	

\* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT \*

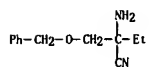
ABSTRACT:  
 The invention relates to a preparation of N-(phenoxyethyl)benzamide derivs. of formula I [wherein: R is halogen, alkyl, haloalkyl, or alkoxyalkyl, etc.; X is a single bond, O, S, S(O), or SO2; R1 is (CN)1-4; R2 is (X)1-5; X1 is CN, halogen, (halo)alkyl, or alkylthio, etc.], useful as insecticides. For instance, N-(phenoxyethyl)benzamide derivative II was prepared via amination of 4-(trifluoromethoxy)benzoyl chloride with amine III. In vivo tests on trichosternylus colubriformis and haemonchus contortus on mongolian gerbils showed that preferred invention compds. sharply reduced nematode infestation (for instance, compound II completely eliminated nematode infestation at a dose of 16 mg/kg).

IT 856675-47-3P 856675-48-4P 856675-49-5P  
 856675-50-8P 856675-51-9P 856675-52-0P  
 856675-53-1P 856675-54-2P 856675-55-3P  
 856675-56-4P 856675-57-5P 856675-58-6P  
 856675-59-7P 856675-60-8P 856675-61-1P

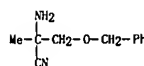
L4 ANSWER 14 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



IT 862693-85-4P, 2-Amino-2-[(benzyloxy)methyl]butyronitrile  
 862693-88-7P, 2-Amino-2-benzyloxy-2-methylpropionitrile  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of silyl-containing carboxamides as cysteine protease inhibitors)  
 RN 862693-85-4 CAPLUS  
 CN Butanenitrile, 2-amino-2-[(phenylmethoxy)methyl]- (CA INDEX NAME)

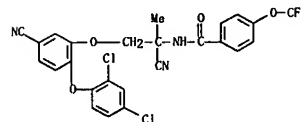


RN 862693-88-7 CAPLUS  
 CN Propanenitrile, 2-amino-2-methyl-3-(phenylmethoxy)- (CA INDEX NAME)

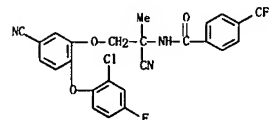


L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

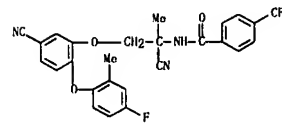
856675-62-2P 856675-63-3P 856675-64-4P  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (prep. of N-(phenoxyethyl)benzamide derivs. useful as insecticides)  
 RN 856675-47-3 CAPLUS  
 CN Benzamide, N-[2-[(2-chloro-4-(fluorophenoxy)-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



RN 856675-48-4 CAPLUS  
 CN Benzamide, N-[2-[(2-chloro-4-(fluorophenoxy)-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



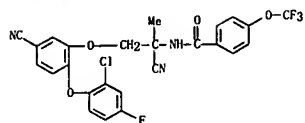
RN 856675-49-5 CAPLUS  
 CN Benzamide, N-[2-[(2-chloro-4-(fluorophenoxy)-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



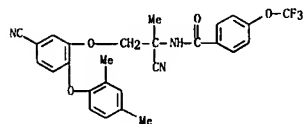
RN 856675-50-8 CAPLUS  
 CN Benzamide, N-[2-[(2-chloro-4-(fluorophenoxy)-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



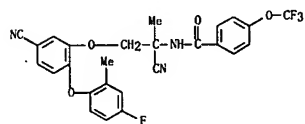
L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



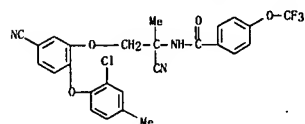
RN 856675-51-9 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(2,4-dimethylphenoxy)phenoxy]-1-methylethyl)-4-(trifluoromethoxy)]- (CA INDEX NAME)



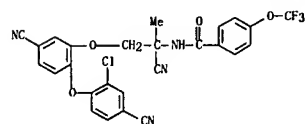
RN 856675-52-0 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(4-fluoro-2-methylphenoxy)phenoxy]-1-methylethyl)-4-(trifluoromethoxy)]- (CA INDEX NAME)



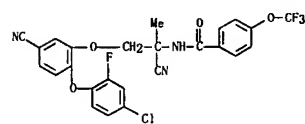
RN 856675-53-1 CAPLUS  
 CN Benzanide, N-[2-[2-(2-chloro-4-methylphenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



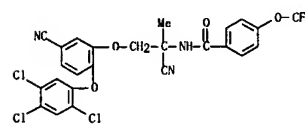
L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



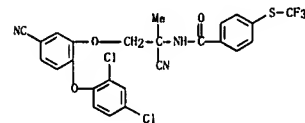
RN 856675-58-6 CAPLUS  
 CN Benzanide, N-[2-[2-(4-chloro-2-fluorophenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)



RN 856675-59-7 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(2,4,5-trichlorophenoxy)phenoxy]-1-methylethyl)-4-(trifluoromethoxy)]- (CA INDEX NAME)



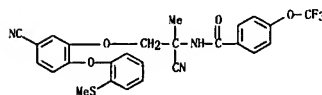
RN 856675-60-0 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(2,4-dichlorophenoxy)phenoxy]-1-methylethyl)-4-[(trifluoromethyl)thio]]- (CA INDEX NAME)



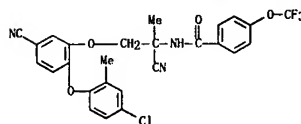
RN 856675-61-1 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(4-fluoro-2-methylphenoxy)phenoxy]-1-methylethyl)-4-[(trifluoromethyl)thio]]- (CA INDEX NAME)

L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

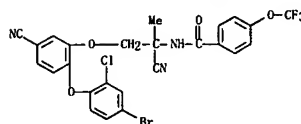
RN 856675-54-2 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-[2-(methylthio)phenoxy]phenoxy]-1-methylethyl)-4-(trifluoromethoxy)]- (CA INDEX NAME)



RN 856675-55-3 CAPLUS  
 CN Benzanide, N-[2-[2-(4-chloro-2-methylphenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)

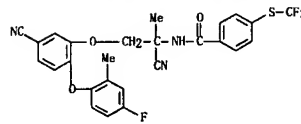


RN 856675-56-4 CAPLUS  
 CN Benzanide, N-[2-[2-(4-bromo-2-chlorophenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)

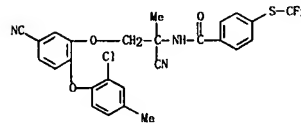


RN 856675-57-5 CAPLUS  
 CN Benzanide, N-[2-[2-(2-chloro-4-cyanophenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)]- (CA INDEX NAME)

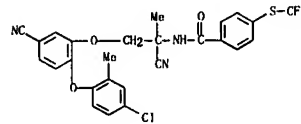
L4 ANSWER 15 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



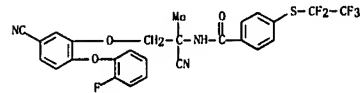
RN 856675-62-2 CAPLUS  
 CN Benzanide, N-[2-[2-(2-chloro-4-methylphenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]]- (CA INDEX NAME)



RN 856675-63-3 CAPLUS  
 CN Benzanide, N-[2-[2-(4-chloro-2-methylphenoxy)-5-cyanophenoxy]-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]]- (CA INDEX NAME)



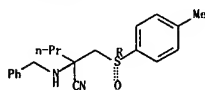
RN 856675-64-4 CAPLUS  
 CN Benzanide, N-[1-cyano-2-([5-cyano-2-(2-fluorophenoxy)phenoxy]-1-methylethyl)-4-[(pentafluoroethyl)thio]]- (9CI) (CA INDEX NAME)



REFERENCE COUNT: 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 16 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2005:508894 CAPLUS  
 DOCUMENT NUMBER: 143:325839  
 TITLE: Reactions of enantiopure  $\beta$ -ketimino sulfoxides with Et<sub>2</sub>AlCN. Scope and limitations in asymmetric synthesis of  $\alpha$ -aminonitriles  
 AUTHOR(S): Runno, Jose L. Garcia; Garcia, Maria Cifuentes; Navarro, Angel L.; Tato, Francisco; Castro, Ana M. Martin  
 CORPORATE SOURCE: Departamento de quimica Organica, Universidad Autonoma de Madrid, Cantoblanco, Madrid, 28049, Spain  
 SOURCE: ARKIVOC (Gainesville, FL, United States) (2005), (6), 33-45  
 CODEN: ACPUAR  
 URL: [http://www.arkat-usa.org/ark:/journal/2005/106\\_Juarist/1381/EJ-1381C.pdf](http://www.arkat-usa.org/ark:/journal/2005/106_Juarist/1381/EJ-1381C.pdf)  
 PUBLISHER: Arkat USA Inc.  
 DOCUMENT TYPE: Journal: (online computer file)  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 143:325839  
 ABSTRACT: Results obtained in the reactions of Et<sub>2</sub>AlCN with exocyclic, endocyclic, and acyclic  $\alpha$ -p-tolylsulfinyl ketimines are reported. Good conversions and satisfactory stereochemical results are obtained exclusively from cyclic ketimines. Imine-enamine equilibrium accounts for the incomplete conversions and low reactivities observed for acyclic amines. Configurational assignments and mechanistic proposals are based on the conformational anal. of substrates and products.

IT 865363-84-4P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (major (2R)-pentanenitrile: reactions of enantiopure  $\beta$ -ketimino sulfoxides with Et<sub>2</sub>AlCN, scope and limitations in asym. synthesis of  $\alpha$ -aminonitriles)  
 RN 865363-84-4 CAPLUS  
 CN Pentanenitrile, 2-[[[(R)-(4-methylphenyl)sulfinyl]methyl]-2-(phenylmethyl)amino]- (CA INDEX NAME)  
 Absolute stereochemistry.



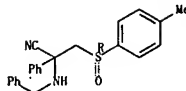
IT 865363-85-5P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (major (2R)-propanenitrile: reactions of enantiopure  $\beta$ -ketimino sulfoxides with Et<sub>2</sub>AlCN, scope and limitations in asym. synthesis of  $\alpha$ -aminonitriles)  
 RN 865363-85-5 CAPLUS  
 CN Benzenenitrile,  $\alpha$ -[[[(R)-(4-methylphenyl)sulfinyl]methyl]- $\alpha$ -(phenylmethyl)amino]- (CA INDEX NAME)  
 Absolute stereochemistry.

L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2005:429386 CAPLUS  
 DOCUMENT NUMBER: 142:481750  
 TITLE: A preparation of acetonitrile derivatives, useful as pesticides  
 INVENTOR(S): Gauvry, Noelle; Goebel, Thomas; Ducray, Pierre; Pautrat, Francois; Kaminsky, Ronald; Jung, Martin  
 PATENT ASSIGNEE(S): Novartis A.-G., Swiss; Novartis Pharma G.m.b.H.  
 SOURCE: PCT Int. Appl., 48 pp.  
 CODEN: PIRX22  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005044784	A1	20050519	WO 2004-EP12559	20041105
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SV, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
AU 2004287611	A1	20050519	AU 2004-287611	20041105
CA 2544741	A1	20050519	CA 2004-2544741	20041105
EP 1682493	A1	20060726	EP 2004-797665	20041105
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, IS				
BR 2004016294	A	20070123	BR 2004-16294	20041105
CN 1902162	A	20070124	CN 2004-80039913	20041105
JP 2007510632	T	20070426	JP 2006-537263	20041105
MX 2006PA05036	A	20060706	MX 2006-PA5036	20060504
KR 793462	B1	20080114	KR 2006-708717	20060504
IN 2006CN01565	A	20070706	IN 2006-CN1565	20060505
US 2007029944	A1	20070329	US 2006-577369	20060626
PRIORITY APPLN. INFO.:			EP 2003-25290	A 20031106
			GB 2004-2677	A 20040206
			WO 2004-EP12559	W 20041105

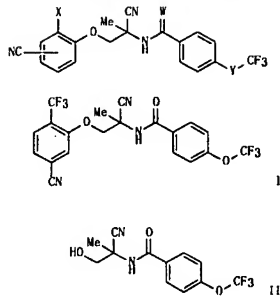
OTHER SOURCE(S): MARPAT 142:481750  
 GRAPHIC IMAGE:

L4 ANSWER 16 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



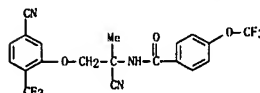
REFERENCE COUNT: 27 THERE ARE 27 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



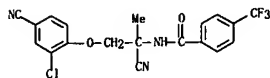
ABSTRACT:  
 The invention relates to a preparation of acetonitrile derivs. of formula I [wherein: X is Cl, Br, or CF<sub>3</sub>; Y is a single bond, O, S, S(O), or SO<sub>2</sub>; W is O or S], useful as pesticides. The active ingredients have advantageous pesticidal properties. They are especially suitable for controlling parasites in and on warm-blooded animals. For instance, acetonitrile derivative II was prepared via etherification of alc. III by 3-fluoro-4-(trifluoromethyl)benzonitrile. The efficacy was calculated as the % reduction of the number of worms in each gerbil, compared with the geometric average of number of worms from 6 infected and untreated gerbils (Mongolian gerbils, 3.2 mg/kg; H. contortus: 100%, T. colubriformis: 100%).

IT 851976-33-5P 851976-34-6P 851976-35-7P  
 851976-36-8P 851976-37-9P 851976-38-0P  
 851976-39-1P 851976-40-4P 851976-42-6P  
 851976-44-8P 851976-47-1P 851976-50-6P  
 851976-52-6P 851976-54-0P 851976-56-2P  
 851976-58-4P 851976-60-8P 851976-62-0P  
 851976-64-2P 851976-66-4P 851976-68-6P  
 851976-69-7P 851976-70-0P 851976-72-2P  
 851976-74-4P 851976-76-6P 851976-77-7P  
 851976-78-6P 851976-80-2P  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of acetonitrile derivs. useful as pesticides)  
 RN 851976-33-5 CAPLUS  
 CN Benzamide, N-[4-cyano-2-[5-cyano-2-(trifluoromethyl)phenoxy]-1-methylallyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

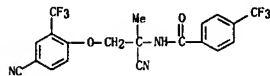


L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

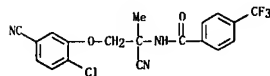
RN 851976-34-6 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



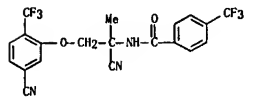
RN 851976-35-7 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(4-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



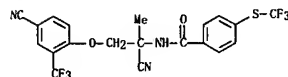
RN 851976-36-8 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



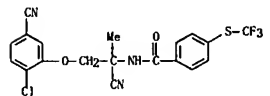
RN 851976-37-9 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



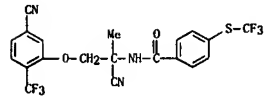
RN 851976-38-0 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



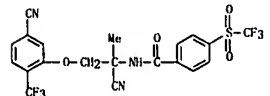
RN 851976-47-1 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)



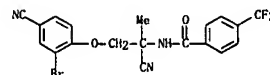
RN 851976-50-6 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)



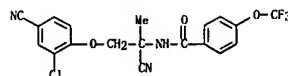
RN 851976-52-8 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(5-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)



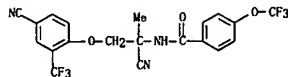
RN 851976-54-0 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



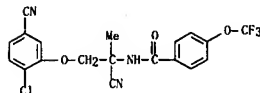
L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



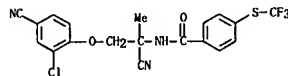
RN 851976-39-1 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(4-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 851976-40-4 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



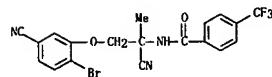
RN 851976-42-6 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)



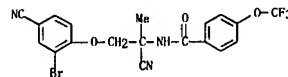
RN 851976-44-8 CAPLUS  
 CN Benzamide, N-[1-cyano-2-(4-cyano-2-(trifluoromethyl)phenoxy)-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

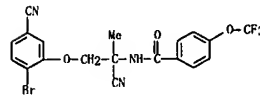
RN 851976-56-2 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



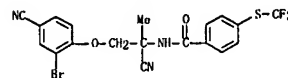
RN 851976-58-4 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 851976-60-8 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

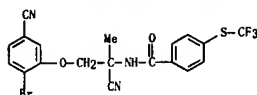


RN 851976-62-0 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

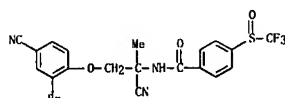


RN 851976-64-2 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

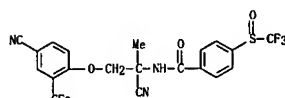
L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



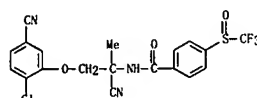
RN 851976-66-4 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)



RN 851976-68-6 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

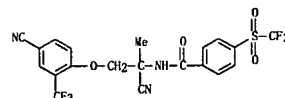


RN 851976-69-7 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

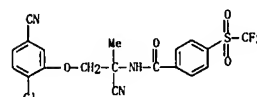


RN 851976-70-0 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

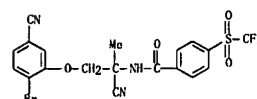
L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 851976-78-8 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

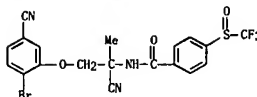


RN 851976-80-2 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-5-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

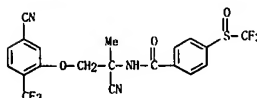


REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

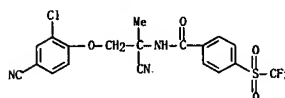
L4 ANSWER 17 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



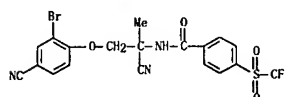
RN 851976-72-2 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[5-cyano-2-(trifluoromethyl)phenoxy]-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)



RN 851976-74-4 CAPLUS  
 CN Benzamide, N-[2-(2-chloro-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)



RN 851976-76-6 CAPLUS  
 CN Benzamide, N-[2-(2-bromo-4-cyanophenoxy)-1-cyano-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

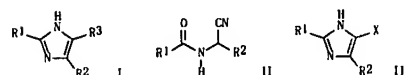


RN 851976-77-7 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[4-cyano-2-(trifluoromethyl)phenoxy]-1-methylethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

L4 ANSWER 18 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

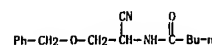
ACCESSION NUMBER: 2005/2233 CAPLUS  
 DOCUMENT NUMBER: 142:93825  
 TITLE: Process for preparing 2,4,5-trisubstituted imidazoles from N-acylated α-aminonitriles via 2,4-disubstituted-5-haloimidazole intermediates  
 INVENTOR(S): Askin, David; Lee, Jaemoon; Zhong, Yong-li  
 PATENT ASSIGNEE(S): USA  
 SOURCE: U.S. Pat. Appl. Publ., 8 pp.  
 DOCUMENT TYPE: CODEN: USXXCO  
 LANGUAGE: Patent  
 FAMILY ACC. NUM. COUNT: English  
 PATENT INFORMATION: 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 2004267026	A1	20041230	US 2004-860916	20040604
PRIORITY APPL. INFO:			US 2003-476389P	20030606
OTHER SOURCE(S):			CASREACT 142:93825	WARPAT 142:93825



ABSTRACT:  
 The invention provides a process for preparing title compds. I from N-acylated α-aminonitriles II via intermediates III under mild conditions, wherein R1 = H, alkyl, -CH2aryl or aryl; R2 = H, alkyl, -CH2O-aryl or aryl; X = Cl or Br. Compds. I are very useful for the preparation of corresponding imidazole-containing pharmaceutical compds. such as losartan, and related angiotensin II antagonists. II is treated with a phosphine and a carbon tetrachloride in a solvent at 25-55° C for 4-20 h to form a 2,4-disubstituted-5-haloimidazole III. Palladium-catalyzed coupling of this intermediate with R3(OH)2 leads to I. For example, reaction of RnCH2CHO with NaCN and NMACI followed by condensation with valeric acid gave aminopropionitrile II (R1 = n-Bu, R2 = CH2OH) in overall 70% yield. This compound underwent cyclization with carbon tetrachloride in the presence of PPh3 at 45° C in CH3CN for 4 h to give III (R1 = n-Bu, R2 = CH2OH, X = Cl) in 81% yield. Next debenzoylation with methanesulfonic acid in chloroform at rt for 1 h yielded the corresponding alc. III (R1 = n-Bu, R2 = CH2OH, X = Cl) in 90% yield. This product is a precursor to losartan.

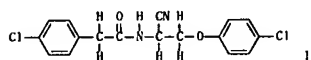
IT 679412-75-OP  
 RL: IMF (Industrial manufacture); RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation trisubstituted imidazoles from acylated aminonitriles via cyclization with tetrahalocarbons in presence of PPh3 to disubstituted haloimidazoles followed by Pd-catalyzed coupling with boronic acids)  
 RN 679412-75-0 CAPLUS  
 CN Pentanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]- (CA INDEX NAME)



L4 ANSWER 18 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2004:650899 CAPLUS  
 DOCUMENT NUMBER: 141:173978  
 TITLE: Preparation of aminoacetonitrile derivatives as agricultural and horticultural insecticides  
 INVENTOR(S): Andoh, Nobuharu; Sanpei, Osamu; Sakata, Kazuyuki  
 PATENT ASSIGNEE(S): Nihon Nohyaku Co., Ltd., Japan  
 SOURCE: Eur. Pat. Appl., 48 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 1445251	A1	20040811	EP 2004-10346	19990428
EP 1445251	B1	20061227		
R: CH, DE, FR, GB, IT, LI	A2	19991103	EP 1999-107461	19990428
EP 953565	A3	20021204		
EP 953565	B1	20040908		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO			JP 1998-137806	A 19980501
PRIORITY APPL. INFO:			EP 1999-107461	A3 19990428
OTHER SOURCE(S):			MARPAT 141:173978	
GRAPHIC IMAGE:				



ABSTRACT:  
 The title compds. Ar1(Q) dC(O)NR3C(CN)R4(CR5R6)aW(CR7R8)bar2 [1: Ar1, Ar2 = (substituted) Ph, (substituted) phenyloxy, (substituted) phenylacetylene; (substituted) pyridyl and (substituted) naphthyl; Q = CR1R2 (wherein R1, R2 = H, halo, (halo)alkyl, etc.); R3 = H, (halo)alkyl, etc.; R4-R6 = H, halo, (halo)alkyl, etc.; W = O, S, SO2 or NR9 (wherein R9 = H, alkyl); a, b = 0-4; d = 0-1], useful as insecticides, were prepared. E.g., a multi-step synthesis of II (starting from 4-chlorophenol and bromoacetaldehyde dimethylacetal), was given. The compds. I were tested against diamondback moth and against smaller tea tortrix (data were given for representative compds. I).

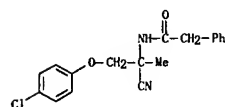
IT 247197-14-4P 247197-20-2P 247197-22-4P  
 247197-35-9P 247197-37-1P 247197-39-3P  
 247197-41-7P 247197-43-9P 247197-45-1P  
 247197-56-4P 247197-62-2P 247197-63-3P  
 247197-64-4P 247197-65-5P 247197-66-6P  
 247197-67-7P 247197-68-6P 247197-71-3P  
 247197-72-4P 247197-73-5P 247197-74-6P  
 247197-75-7P 247197-76-8P 247197-77-9P  
 247197-78-0P 247197-79-1P 247197-80-4P  
 247197-81-5P 247197-82-6P 247197-88-0P  
 247197-87-1P 247197-88-2P 247197-89-3P  
 247197-90-6P 247197-96-2P 247197-99-5P  
 247198-00-1P 247198-01-2P 247198-02-3P

L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

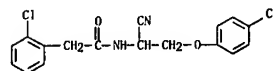
247198-03-4P 247198-04-5P 247198-05-6P  
 247198-06-7P 247198-07-8P 247198-08-9P  
 247198-09-0P 247198-10-3P 247198-11-4P  
 247198-12-5P 247198-13-6P 247198-14-7P  
 247198-15-8P 247198-16-9P 247198-17-0P  
 247198-18-1P 247198-19-2P 247198-20-5P  
 247198-21-6P 247198-22-7P 247198-23-8P  
 247198-24-9P 247198-25-0P 247198-26-1P  
 247198-27-2P 247198-29-4P 247198-30-7P  
 247198-31-8P 247198-32-9P 247198-33-0P  
 247198-34-1P 247198-35-2P 247198-36-3P  
 247198-37-4P 247198-38-5P 247198-39-6P  
 247198-40-9P 247198-41-0P 247198-43-2P  
 247198-45-4P 247198-46-5P 247198-47-6P  
 247198-48-7P 247198-49-8P 247198-50-1P  
 247198-51-2P 247198-52-3P 247198-57-8P  
 247198-58-9P 247198-59-0P 247198-60-3P  
 247198-61-4P 247198-62-5P 247198-64-7P  
 247198-65-0P 247198-66-9P 247198-67-0P  
 247198-68-1P 247198-69-2P 247198-70-5P  
 247198-71-6P 247198-72-7P 247198-73-8P  
 247198-74-9P 247198-75-0P 247198-76-1P  
 247198-77-2P 247198-78-3P 247198-79-4P  
 247198-80-7P 247198-81-8P 247198-82-9P  
 247198-83-0P 247198-84-1P 247198-86-3P  
 247198-87-4P 247198-88-5P 247198-89-6P  
 247198-90-9P 247198-91-0P 247198-92-1P  
 247198-93-2P 247198-94-3P 247198-95-4P  
 247198-96-5P 247198-97-6P 247198-98-7P  
 247198-99-8P 247199-01-5P 247199-02-6P  
 247199-03-7P 247199-04-8P 247199-05-9P  
 247199-06-0P 247199-09-3P 247199-10-6P  
 247199-11-7P 247199-12-8P 247199-13-9P  
 247199-14-0P 247199-15-1P 247199-17-3P  
 247199-18-4P 247199-19-5P 247199-20-8P  
 247199-21-9P 247199-22-0P 247199-23-1P  
 247199-24-2P 247199-25-3P 247199-28-6P  
 247199-31-1P 247199-32-2P 247199-33-3P  
 247199-34-4P 247199-36-6P 247199-37-7P  
 247199-38-8P 247199-39-9P 247199-40-2P  
 247199-41-3P 247199-42-4P 247199-43-5P  
 247199-44-6P 247199-45-7P 247199-46-8P  
 247199-47-9P 247199-48-0P 247199-49-1P  
 247199-50-4P 247199-51-5P 247199-52-6P  
 247199-54-8P 247199-55-9P 247199-56-0P  
 247199-57-1P 247199-58-2P 247199-59-3P  
 247199-60-6P 247199-61-7P 247199-62-8P  
 247199-63-9P 247199-64-0P 247199-65-1P  
 247199-66-2P 247199-67-3P 247199-68-4P  
 247199-69-5P 247199-70-8P 247199-71-9P  
 247199-72-0P 247199-73-1P 247199-74-2P  
 247199-75-3P 247199-76-4P 247199-77-5P  
 247199-78-6P 247199-79-7P 247199-80-8P  
 247199-81-1P 247199-85-5P 247199-86-6P  
 247199-87-7P 247199-88-8P 247199-89-9P  
 247199-90-2P 247199-92-4P 247199-93-5P  
 247199-94-6P 247199-95-7P 247201-37-2P  
 438548-44-8P 736172-72-8P 736172-75-1P  
 736172-78-4P 736172-82-0P 736172-83-1P  
 736172-86-4P 736172-89-7P 736172-90-0P  
 736172-91-1P 736172-92-2P 736172-93-3P

RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)

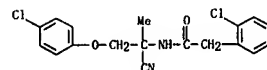
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 (prepn. of aminoacetonitrile derivs. as agricultural and horticultural insecticides)  
 RN 247197-14-4 CAPLUS  
 CN Benzenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



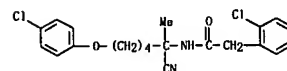
RN 247197-20-2 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyanoethyl]- (CA INDEX NAME)



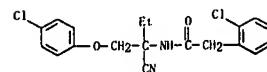
RN 247197-22-4 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247197-35-9 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

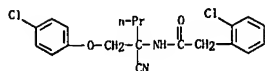


RN 247197-37-1 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanoethyl]- (CA INDEX NAME)

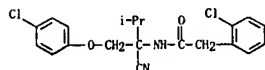


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

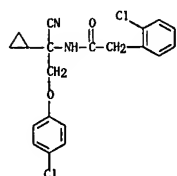
RN 247197-39-3 CAPLUS  
 CN Benzeneacetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]-  
 (CA INDEX NAME)



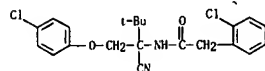
RN 247197-41-7 CAPLUS  
 CN Benzeneacetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



RN 247197-43-9 CAPLUS  
 CN Benzeneacetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)

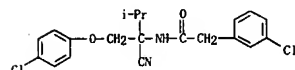


RN 247197-45-1 CAPLUS  
 CN Benzeneacetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)

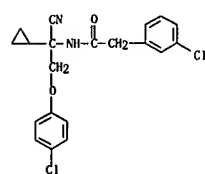


RN 247197-56-4 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-fluoro-  
 (CA INDEX NAME)

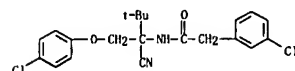
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



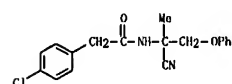
RN 247197-67-7 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)



RN 247197-68-8 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)



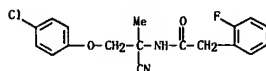
RN 247197-71-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-(1-cyano-1-methyl-2-phenoxyethyl)- (CA INDEX NAME)



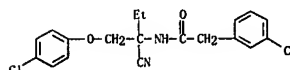
RN 247197-72-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(phenylthio)ethyl]- (CA INDEX NAME)



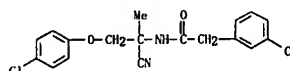
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



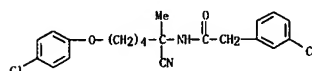
RN 247197-62-2 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]-  
 (CA INDEX NAME)



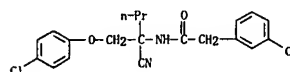
RN 247197-63-3 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-  
 (CA INDEX NAME)



RN 247197-64-4 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]-  
 (CA INDEX NAME)



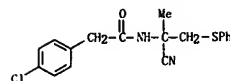
RN 247197-65-5 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]-  
 (CA INDEX NAME)



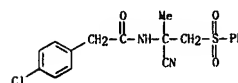
RN 247197-66-6 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



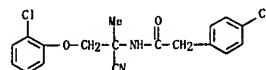
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



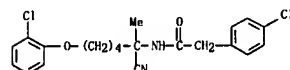
RN 247197-73-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(phenylsulfonyl)ethyl]-  
 (CA INDEX NAME)



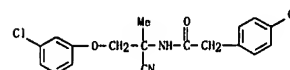
RN 247197-74-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]-  
 (CA INDEX NAME)



RN 247197-75-7 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[5-(2-chlorophenoxy)-1-cyano-1-methylpentyl]-  
 (CA INDEX NAME)



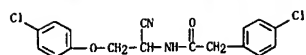
RN 247197-76-8 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(3-chlorophenoxy)-1-cyano-1-methylethyl]-  
 (CA INDEX NAME)



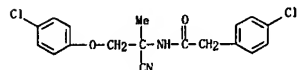
RN 247197-77-9 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyanoethyl]- (CA INDEX NAME)



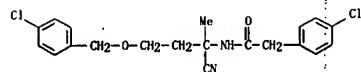
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



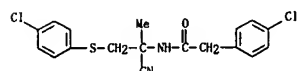
RN 247197-78-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



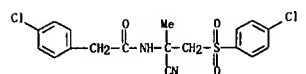
RN 247197-79-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[3-[(4-chlorophenyl)methoxy]-1-cyano-1-methylpropyl]- (CA INDEX NAME)



RN 247197-80-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-[(4-chlorophenyl)thio]-1-cyano-1-methylpropyl]- (CA INDEX NAME)

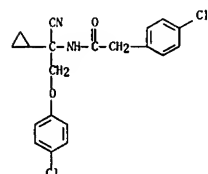


RN 247197-81-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-[(4-chlorophenyl)sulfonyl]-1-cyano-1-methylpropyl]- (CA INDEX NAME)

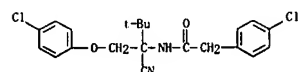


RN 247197-82-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

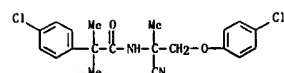
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



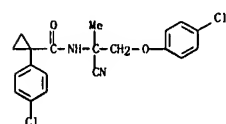
RN 247197-90-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)



RN 247197-96-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylpropyl]- (CA INDEX NAME)

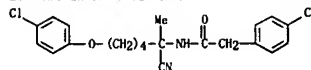


RN 247197-99-5 CAPLUS  
 CN Cyclopropanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)

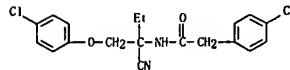


RN 247198-00-1 CAPLUS  
 CN Cyclobutanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)

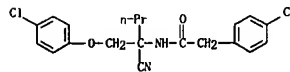
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



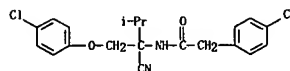
RN 247197-86-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)



RN 247197-87-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]- (CA INDEX NAME)

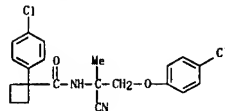


RN 247197-88-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)

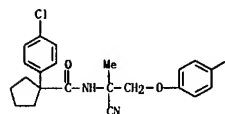


RN 247197-89-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)

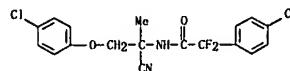
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



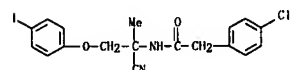
RN 247198-01-2 CAPLUS  
 CN Cyclopentanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)



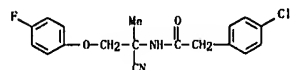
RN 247198-02-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247198-03-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]- (CA INDEX NAME)

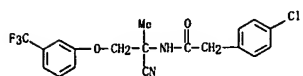


RN 247198-04-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]- (CA INDEX NAME)

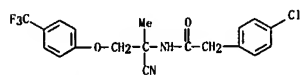


RN 247198-05-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(3-

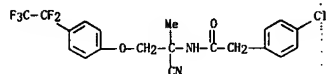
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



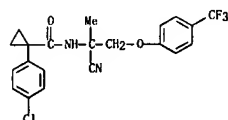
RN 247198-06-7 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247198-07-8 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(pentafluoroethyl)phenoxy]ethyl]- (9C1) (CA INDEX NAME)

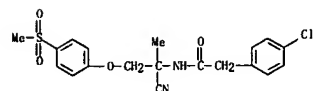


RN 247198-08-9 CAPLUS  
CN Cyclopropanecarboxamide, 1-(4-chlorophenyl)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

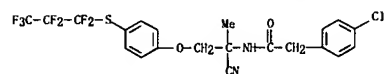


RN 247198-09-0 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-(heptafluoropropyl)phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

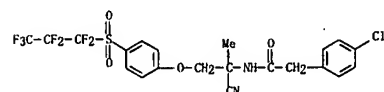
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



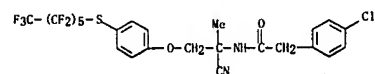
RN 247198-15-8 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(heptafluoropropyl)thio]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



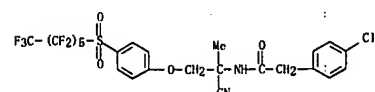
RN 247198-16-9 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(heptafluoropropyl)sulfonyl]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



RN 247198-17-0 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)thio]phenoxy]ethyl]- (9C1) (CA INDEX NAME)

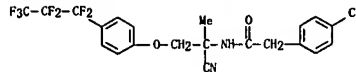


RN 247198-18-1 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)sulfonyl]phenoxy]ethyl]- (9C1) (CA INDEX NAME)

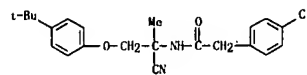


RN 247198-19-2 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[[5-(trifluoromethyl)-

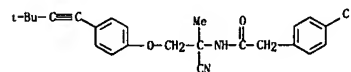
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



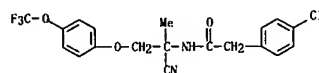
RN 247198-10-3 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-(1,1-dimethylethyl)phenoxy]-1-methylethyl]- (CA INDEX NAME)



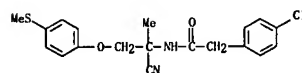
RN 247198-11-4 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-(3,3-dimethyl-1-butynyl)phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



RN 247198-12-5 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]- (CA INDEX NAME)

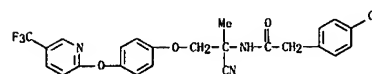


RN 247198-13-6 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(methylthio)phenoxy]ethyl]- (CA INDEX NAME)

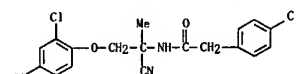


RN 247198-14-7 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(methylsulfonyl)phenoxy]ethyl]- (CA INDEX NAME)

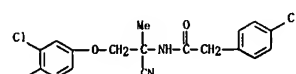
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



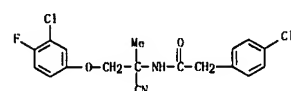
RN 247198-20-5 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



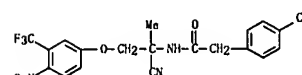
RN 247198-21-6 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



RN 247198-22-7 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[2-(3-chloro-4-fluorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



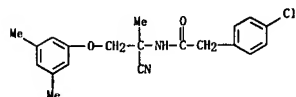
RN 247198-23-8 CAPLUS  
CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-nitro-3-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



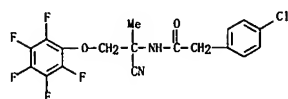
RN 247198-24-9 CAPLUS



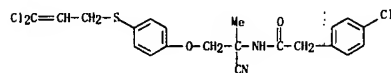
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]- (CA INDEX NAME)



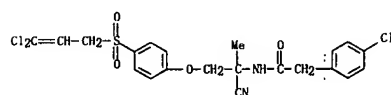
RN 247198-25-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(pentafluorophenoxy)ethyl]- (9CI) (CA INDEX NAME)



RN 247198-26-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)thio]phenoxy]-1-methylethyl]- (9CI) (CA INDEX NAME)



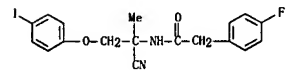
RN 247198-27-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)sulfonyl]phenoxy]-1-methylethyl]- (9CI) (CA INDEX NAME)



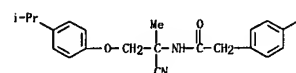
RN 247198-29-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(phenylethynyl)phenoxy]ethyl]- (9CI) (CA INDEX NAME)



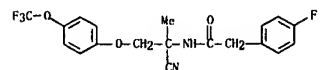
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



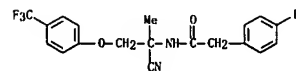
RN 247198-35-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(1-methylethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)



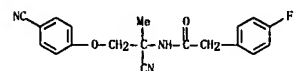
RN 247198-36-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(1-trifluoromethoxyphenoxy)ethyl]-4-fluoro- (CA INDEX NAME)



RN 247198-37-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(1-trifluoromethylphenoxy)ethyl]-4-fluoro- (CA INDEX NAME)



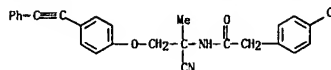
RN 247198-38-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-cyanophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)



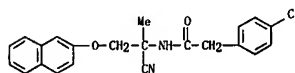
RN 247198-39-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(4-nitrophenoxy)ethyl]-4-fluoro- (CA INDEX NAME)



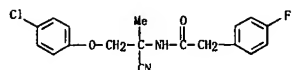
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



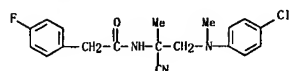
RN 247198-30-7 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(2-naphthalenyloxy)ethyl]- (CA INDEX NAME)



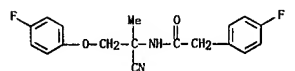
RN 247198-31-8 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)



RN 247198-32-9 CAPLUS  
 CN Benzeneacetamide, N-[2-[(4-chlorophenyl)methylamino]-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)



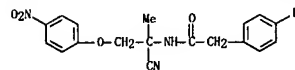
RN 247198-33-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)



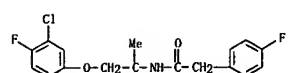
RN 247198-34-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)



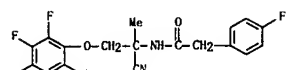
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



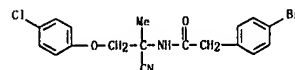
RN 247198-40-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(3-chloro-4-fluorophenoxy)-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)



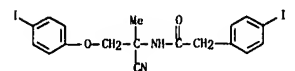
RN 247198-41-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-(pentafluorophenoxy)ethyl]-4-fluoro- (9CI) (CA INDEX NAME)



RN 247198-43-2 CAPLUS  
 CN Benzeneacetamide, 4-bromo-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



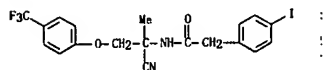
RN 247198-45-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-iodo- (CA INDEX NAME)



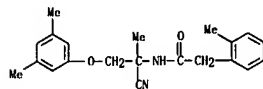
RN 247198-46-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(1-trifluoromethyl)phenoxy]ethyl]-4-iodo- (CA INDEX NAME)



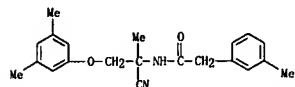
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



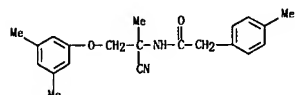
RN 247198-47-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-2-methyl- (CA INDEX NAME)



RN 247198-48-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-3-methyl- (CA INDEX NAME)

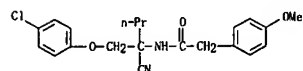


RN 247198-49-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-4-methyl- (CA INDEX NAME)

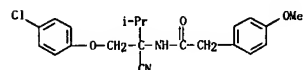


RN 247198-50-1 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-(trifluoromethyl)- (CA INDEX NAME)

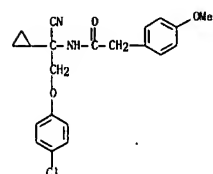
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



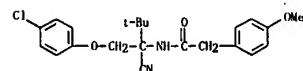
RN 247198-60-3 CAPLUS  
 CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]-4-methoxy- (CA INDEX NAME)



RN 247198-61-4 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]-4-methoxy- (CA INDEX NAME)

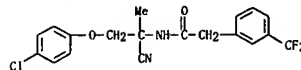


RN 247198-62-5 CAPLUS  
 CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]-4-methoxy- (CA INDEX NAME)

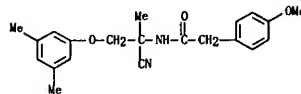


RN 247198-64-7 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(heptafluoropropyl)- (9CI) (CA INDEX NAME)

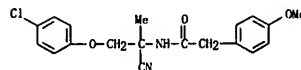
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



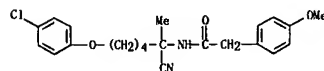
RN 247198-51-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-4-methoxy- (CA INDEX NAME)



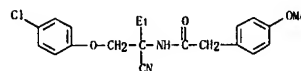
RN 247198-52-3 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-methoxy- (CA INDEX NAME)



RN 247198-57-8 CAPLUS  
 CN Benzeneacetamide, N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]-4-methoxy- (CA INDEX NAME)

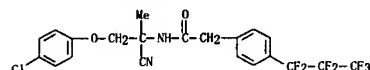


RN 247198-58-9 CAPLUS  
 CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]-4-methoxy- (CA INDEX NAME)

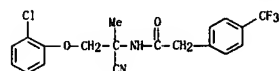


RN 247198-59-0 CAPLUS  
 CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]-4-methoxy- (CA INDEX NAME)

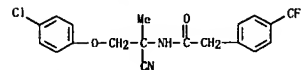
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



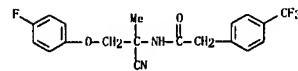
RN 247198-65-8 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



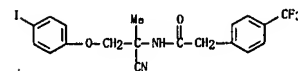
RN 247198-66-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-67-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

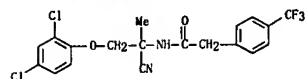


RN 247198-68-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

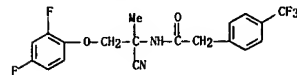


RN 247198-69-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

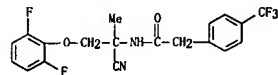
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



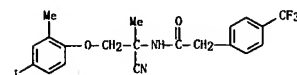
RN 247198-70-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,4-difluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



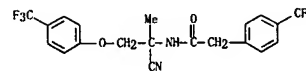
RN 247198-71-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,6-difluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-72-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodo-2-methylphenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

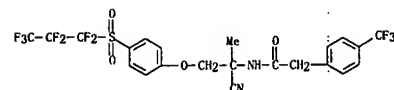


RN 247198-73-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

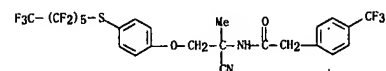


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

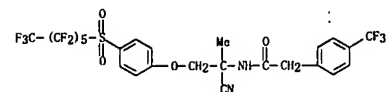
RN 247198-79-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-[(heptafluoropropyl)sulfonyl]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



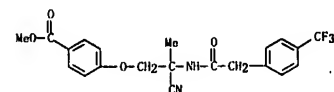
RN 247198-80-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)thio]phenoxy]ethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



RN 247198-81-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)sulfonyl]phenoxy]ethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



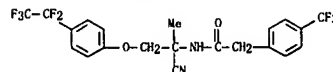
RN 247198-82-9 CAPLUS  
 CN Benzoic acid, 4-[2-cyano-2-[[4-(trifluoromethyl)phenyl]acetyl]amino]propyl)-, methyl ester (9C1) (CA INDEX NAME)



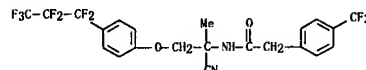
RN 247198-83-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)sulfonyl]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)

L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

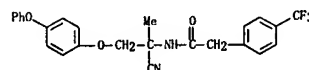
RN 247198-74-9 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(pentafluoroethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



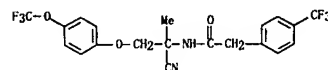
RN 247198-75-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-(heptafluoropropyl)phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



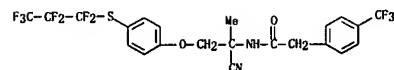
RN 247198-76-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(phenoxyphenoxy)ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-77-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

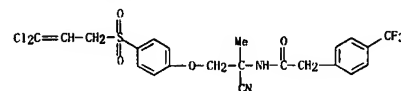


RN 247198-78-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-[(heptafluoropropyl)thio]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)

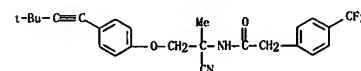


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

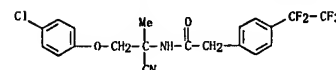
RN 247198-84-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-(3,3-dimethyl-1-butynyl)phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9C1) (CA INDEX NAME)



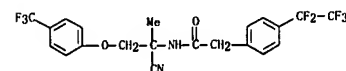
RN 247198-86-3 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(pentafluoroethyl)- (9C1) (CA INDEX NAME)



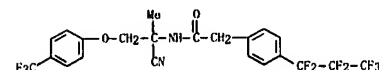
RN 247198-87-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(pentafluoroethyl)- (9C1) (CA INDEX NAME)



RN 247198-88-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(heptafluoropropyl)- (9C1) (CA INDEX NAME)

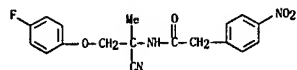


RN 247198-89-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-nitro- (CA INDEX NAME)

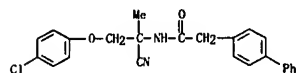


RN 247198-89-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-nitro- (CA INDEX NAME)

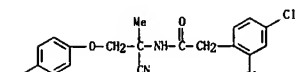
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



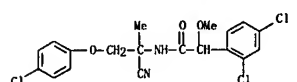
RN 247198-90-9 CAPLUS  
CN [1,1'-Biphenyl]-4-acetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



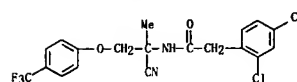
RN 247198-91-0 CAPLUS  
CN Benzenecetamide, 2,4-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247198-92-1 CAPLUS  
CN Benzenecetamide, 2,4-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-a-methoxy- (CA INDEX NAME)

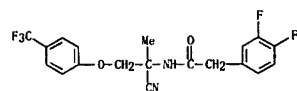


RN 247198-93-2 CAPLUS  
CN Benzenecetamide, 2,4-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

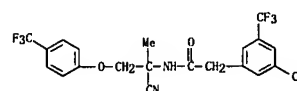


RN 247198-94-3 CAPLUS

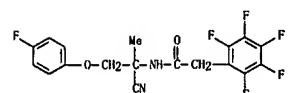
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



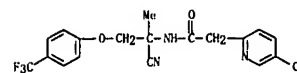
RN 247198-99-8 CAPLUS  
CN Benzenecetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3,5-bis(trifluoromethyl)- (CA INDEX NAME)



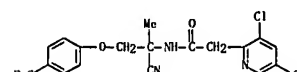
RN 247199-01-5 CAPLUS  
CN Benzenecetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-2,3,4,5,6-pentafluoro- (CA INDEX NAME)



RN 247199-02-6 CAPLUS  
CN 2-Pyridineacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)

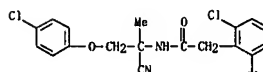


RN 247199-03-7 CAPLUS  
CN 2-Pyridineacetamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)

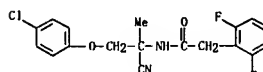


RN 247199-04-8 CAPLUS

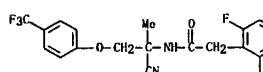
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
CN Benzenecetamide, 2,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



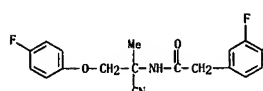
RN 247198-95-4 CAPLUS  
CN Benzenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2,6-difluoro- (CA INDEX NAME)



RN 247198-96-5 CAPLUS  
CN Benzenecetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2,6-difluoro- (CA INDEX NAME)

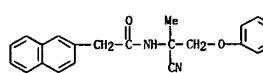


RN 247198-97-6 CAPLUS  
CN Benzenecetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-3,4-difluoro- (CA INDEX NAME)

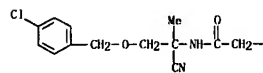


RN 247198-98-7 CAPLUS  
CN Benzenecetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3,4-difluoro- (CA INDEX NAME)

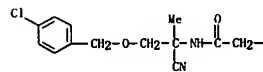
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
CN 2-Naphthalenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



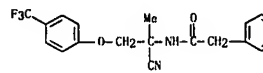
RN 247199-05-9 CAPLUS  
CN Benzenecetamide, N-[2-(4-chlorophenyl)methoxy]-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



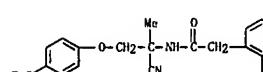
RN 247199-06-0 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[2-[(4-chlorophenyl)methoxy]-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247199-09-3 CAPLUS  
CN Benzenecetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

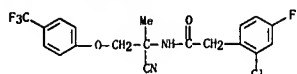


RN 247199-10-6 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-fluoro- (CA INDEX NAME)

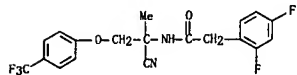


RN 247199-11-7 CAPLUS  
CN Benzenecetamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

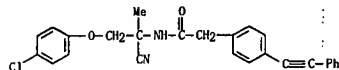
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



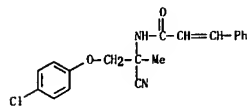
RN 247199-12-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-(4-(trifluoromethyl)phenoxy)ethyl]-2,4-difluoro- (CA INDEX NAME)



RN 247199-13-9 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(phenylethynyl)- (9CI) (CA INDEX NAME)

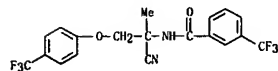


RN 247199-14-0 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-phenyl- (CA INDEX NAME)

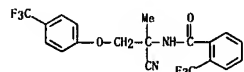


RN 247199-15-1 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-phenyl- (CA INDEX NAME)

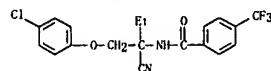
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzamide, N-[1-cyano-1-methyl-2-(4-(trifluoromethyl)phenoxy)ethyl]-3-(trifluoromethyl)- (CA INDEX NAME)



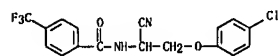
RN 247199-22-0 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-(4-(trifluoromethyl)phenoxy)ethyl]-2-(trifluoromethyl)- (CA INDEX NAME)



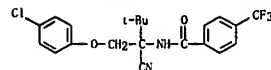
RN 247199-23-1 CAPLUS  
 CN Benzamide, N-[1-(4-chlorophenoxy)methyl]-1-cyanopropyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247199-24-2 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1-cyanonethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

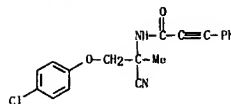


RN 247199-25-3 CAPLUS  
 CN Benzamide, N-[1-(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]-4-(trifluoromethyl)- (CA INDEX NAME)

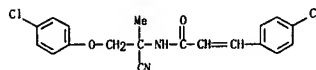


RN 247199-28-6 CAPLUS  
 CN Benzamide, 4-chloro-N-[1-cyano-2-[2,6-dichloro-4-[(3,3-dichloro-2-propenyl)oxy]phenoxy]-1-methylethyl]- (9CI) (CA INDEX NAME)

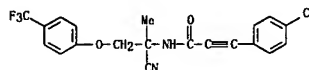
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



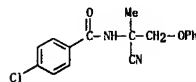
RN 247199-17-3 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-(4-chlorophenyl)- (CA INDEX NAME)



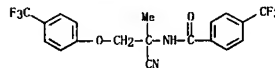
RN 247199-18-4 CAPLUS  
 CN 2-Propenamide, 3-(4-chlorophenyl)-N-[1-cyano-1-methyl-2-(4-(trifluoromethyl)phenoxy)ethyl]- (CA INDEX NAME)



RN 247199-19-5 CAPLUS  
 CN Benzamide, 4-chloro-N-(1-cyano-1-methyl-2-phenoxyethyl)- (CA INDEX NAME)

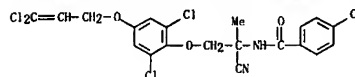


RN 247199-20-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

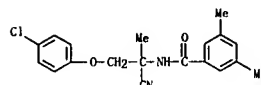


RN 247199-21-9 CAPLUS

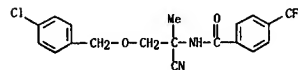
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



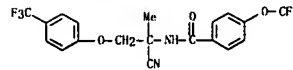
RN 247199-31-1 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3,5-dimethyl- (CA INDEX NAME)



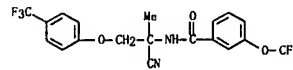
RN 247199-32-2 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenyl)methoxy]-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247199-33-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

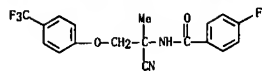


RN 247199-34-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3-(trifluoromethoxy)- (CA INDEX NAME)

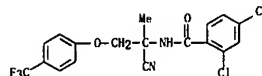


RN 247199-36-6 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

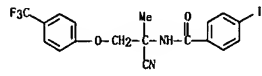
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



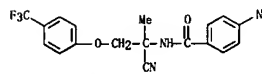
RN 247199-37-7 CAPLUS  
 CN Benzamide, 2,4-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



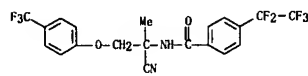
RN 247199-38-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-iodo- (CA INDEX NAME)



RN 247199-39-9 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-nitro- (CA INDEX NAME)



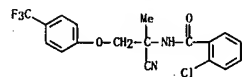
RN 247199-40-2 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(pentafluoroethyl)- (9C1) (CA INDEX NAME)



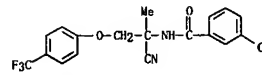
RN 247199-41-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

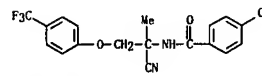
RN 247199-46-8 CAPLUS  
 CN Benzamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



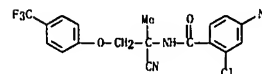
RN 247199-47-9 CAPLUS  
 CN Benzamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



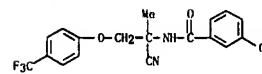
RN 247199-48-0 CAPLUS  
 CN Benzamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-49-1 CAPLUS  
 CN Benzamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-nitro- (CA INDEX NAME)

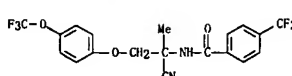


RN 247199-50-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3-methoxy- (CA INDEX NAME)

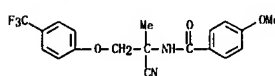


RN 247199-51-5 CAPLUS  
 CN Benzamide, 3,4-dichloro-N-[1-cyano-1-methyl-2-[4-

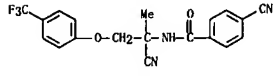
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



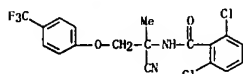
RN 247199-42-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-methoxy- (CA INDEX NAME)



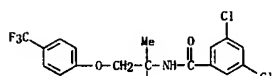
RN 247199-43-5 CAPLUS  
 CN Benzamide, 4-cyano-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-44-6 CAPLUS  
 CN Benzamide, 2,6-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

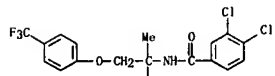


RN 247199-45-7 CAPLUS  
 CN Benzamide, 3,5-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

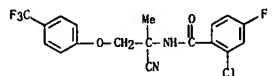


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

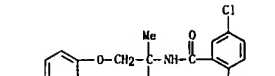
RN 247199-52-6 CAPLUS  
 CN Benzamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)



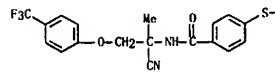
RN 247199-52-6 CAPLUS  
 CN Benzamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)



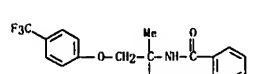
RN 247199-54-8 CAPLUS  
 CN Benzamide, 2,5-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-55-9 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(trifluoromethyl)thio]- (CA INDEX NAME)

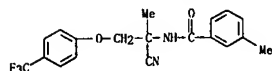


RN 247199-56-0 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-methyl- (CA INDEX NAME)

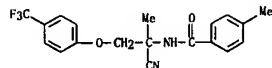


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

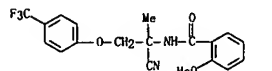
RN 247199-57-1 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3-methyl- (CA INDEX NAME)



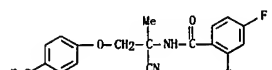
RN 247199-58-2 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-methyl- (CA INDEX NAME)



RN 247199-59-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-methoxy- (CA INDEX NAME)

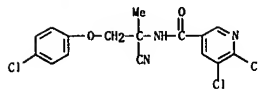


RN 247199-60-6 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2,4-difluoro- (CA INDEX NAME)

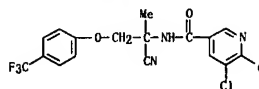


RN 247199-61-7 CAPLUS  
 CN 3-Pyridinecarboxamide, 5,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

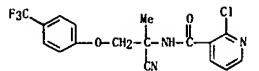
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



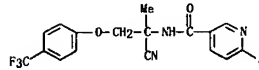
RN 247199-62-8 CAPLUS  
 CN 3-Pyridinecarboxamide, 5,6-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



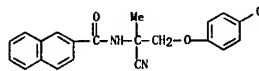
RN 247199-63-9 CAPLUS  
 CN 3-Pyridinecarboxamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-64-0 CAPLUS  
 CN 3-Pyridinecarboxamide, 6-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

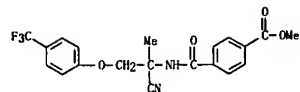


RN 247199-65-1 CAPLUS  
 CN 2-Naphthalenecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

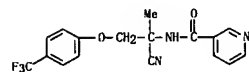


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

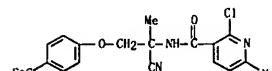
RN 247199-66-2 CAPLUS  
 CN Benzoic acid, 4-[[[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]amino]carbonyl]-, methyl ester (CA INDEX NAME)



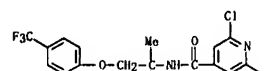
RN 247199-67-3 CAPLUS  
 CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



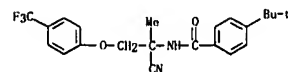
RN 247199-68-4 CAPLUS  
 CN 3-Pyridinecarboxamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-6-methyl- (CA INDEX NAME)



RN 247199-69-5 CAPLUS  
 CN 4-Pyridinecarboxamide, 2,6-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

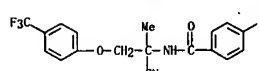


RN 247199-70-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(1,1-dimethylethyl)- (CA INDEX NAME)

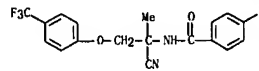


L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

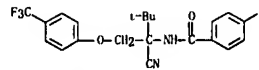
RN 247199-71-9 CAPLUS  
 CN Benzamide, 4-butyl-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



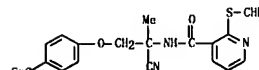
RN 247199-72-0 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(dimethylamino)- (CA INDEX NAME)



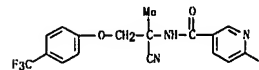
RN 247199-73-1 CAPLUS  
 CN Benzamide, 4-cyano-N-[1-cyano-2,2-dimethyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 247199-74-2 CAPLUS  
 CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-[(difluoromethyl)thio]- (CA INDEX NAME)

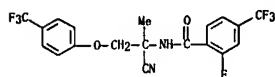


RN 247199-75-3 CAPLUS  
 CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-6-(difluoromethoxy)- (CA INDEX NAME)

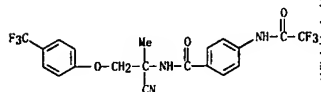


RN 247199-76-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-

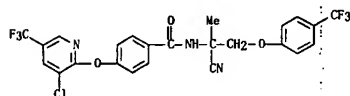
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
fluoro-4-(trifluoromethyl)- (CA INDEX NAME)



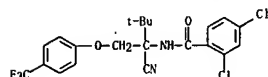
RN 247199-77-5 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(trifluoromethyl)amino]- (9CI) (CA INDEX NAME)



RN 247199-78-6 CAPLUS  
CN Benzamide, 4-[[3-chloro-5-(trifluoromethyl)-2-pyridinyl]oxy]-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

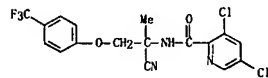


RN 247199-79-7 CAPLUS  
CN Benzamide, 2,4-dichloro-N-[1-cyano-2,2-dimethyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

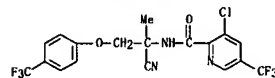


RN 247199-80-0 CAPLUS  
CN Benzamide, 2,4-dichloro-N-[1-cyano-2-methyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

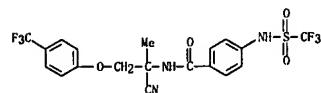
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
CN 2-Pyridinecarboxamide, 3,5-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



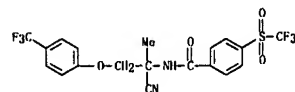
RN 247199-89-9 CAPLUS  
CN 2-Pyridinecarboxamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)



RN 247199-90-2 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[[4-(trifluoromethyl)sulfonyl]amino]- (CA INDEX NAME)

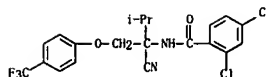


RN 247199-92-4 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

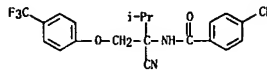


RN 247199-93-5 CAPLUS  
CN 1-Naphthalenecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

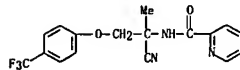
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



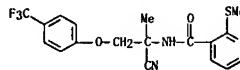
RN 247199-81-1 CAPLUS  
CN Benzamide, 4-cyano-N-[1-cyano-2-methyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



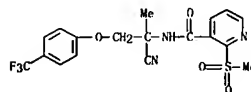
RN 247199-85-5 CAPLUS  
CN 2-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-86-6 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(methylthio)- (CA INDEX NAME)

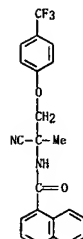


RN 247199-87-7 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(methylsulfonyl)- (CA INDEX NAME)

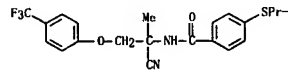


RN 247199-88-8 CAPLUS

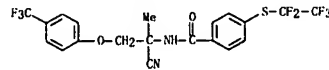
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



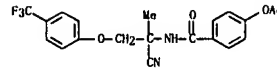
RN 247199-94-6 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(propylthio)- (CA INDEX NAME)



RN 247199-95-7 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(pentafluoroethyl)thio]- (9CI) (CA INDEX NAME)



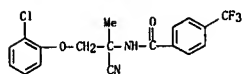
RN 247201-37-2 CAPLUS  
CN Benzamide, 4-(acetoxy)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



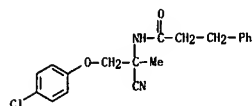
RN 438548-44-8 CAPLUS  
CN Benzamide, N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



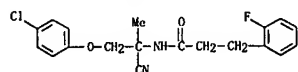
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



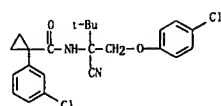
RN 736172-72-8 CAPLUS  
CN Benzenepropanamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 736172-75-1 CAPLUS  
CN Benzenepropanamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-fluoro- (CA INDEX NAME)



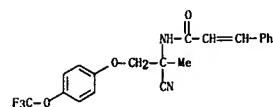
RN 736172-78-4 CAPLUS  
CN Cyclopropanecarboxamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]-1-(3-chlorophenyl)- (CA INDEX NAME)



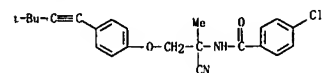
RN 736172-82-0 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-alpha-(1-methylethyl)- (CA INDEX NAME)

L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

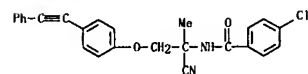
RN 736172-91-1 CAPLUS  
CN 2-Propenamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-3-phenyl- (CA INDEX NAME)



RN 736172-92-2 CAPLUS  
CN Benzanide, 4-chloro-N-[1-cyano-2-[4-(3,3-dimethyl-1-butynyl)phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

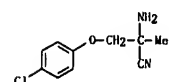


RN 736172-93-3 CAPLUS  
CN Benzanide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(phenylethynyl)phenoxy]ethyl]- (9C1) (CA INDEX NAME)



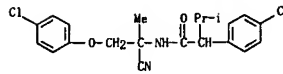
IT 247199-97-9P 247199-98-OP  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(preparation of aminoacetonitrile derivs. as agricultural and horticultural insecticides)

RN 247199-97-9 CAPLUS  
CN Propanenitrile, 2-amino-3-(4-chlorophenoxy)-2-methyl- (CA INDEX NAME)

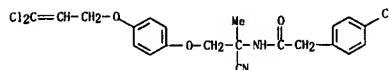


RN 247199-98-0 CAPLUS  
CN Propanenitrile, 3-(4-chlorophenoxy)-2-(ethylamino)-2-methyl- (CA INDEX NAME)

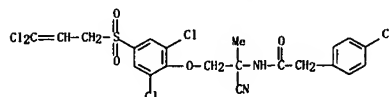
L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



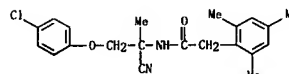
RN 736172-83-1 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)oxy]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



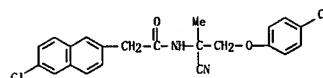
RN 736172-86-4 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[2,6-dichloro-4-[(3,3-dichloro-2-propenyl)sulfonyl]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



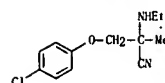
RN 736172-89-7 CAPLUS  
CN Benzenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2,4,6-trimethyl- (CA INDEX NAME)



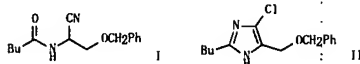
RN 736172-90-0 CAPLUS  
CN 2-Naphthalenecetamide, 6-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



L4 ANSWER 19 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

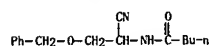


L4 ANSWER 20 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2004:141807 CAPLUS  
 DOCUMENT NUMBER: 140:339247  
 TITLE: New Method for the Synthesis of Diversely  
 Functionalized Imidazoles from N-Acylated  
 α-Aminonitriles  
 AUTHOR(S): Zhong, Yong-Li; Lee, Jaemoon; Reamer, Robert A.;  
 Askin, David  
 CORPORATE SOURCE: Department of Process Research, Merck Research  
 Laboratories, Rahway, NJ, 07065, USA  
 SOURCE: Organic Letters (2004), 6(6), 929-931  
 CODEN: ORLEF7; ISSN: 1523-7060  
 PUBLISHER: American Chemical Society  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 140:339247  
 GRAPHIC IMAGE:



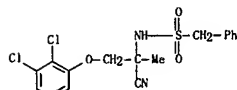
ABSTRACT:  
 A new general method for the synthesis of medicinally important diversely  
 functionalized imidazoles from N-acylated α-aminonitriles has been  
 developed. N-Acylated α-aminonitriles were reacted with  
 triphenylphosphine and carbon tetrachloride to afford 2,4-disubstituted  
 5-halo-1H-imidazoles in good yield. This new method was applied for the  
 synthesis of 2-butyl-4-chloro-5-hydroxymethylimidazole. These haloimidazoles  
 can be directly converted to 2,4,5-trisubstituted imidazoles through  
 palladium-catalyzed coupling reactions. The reaction of N-[1-cyano-2-  
 (phenylmethoxy)ethyl]pentanamide (I) with carbon tetrachloride gave  
 2-butyl-4-chloro-5-(phenylmethoxy)imidazole (II) which upon  
 deprotection gave 2-butyl-5-chloro-1H-imidazole-4-methanol, a synthetic  
 intermediate for cotazant.

IT 679412-75-OP  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (preparation of functionalized imidazoles by triphenylphosphine-mediated  
 reaction of halomethanes with N-(cyanomethyl) amides)  
 RN 679412-75-0 CAPLUS  
 CN Pentanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]- (CA INDEX NAME)



REFERENCE COUNT: 39 THERE ARE 39 CITED REFERENCES AVAILABLE FOR THIS  
 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 21 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(2,3-dichlorophenoxy)-1-  
 methylethyl]- (CA INDEX NAME)



REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS  
 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 21 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2004:2845 CAPLUS  
 DOCUMENT NUMBER: 140:59401  
 TITLE: N-sulfonylaminoacetoneitriles having pesticidal  
 properties  
 INVENTOR(S): Steiger, Arthur; Zambach, Werner; Bouvier, Jacques;  
 Ducray, Pierre  
 PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis Pharma G.m.b.H.  
 SOURCE: PCT Int. Appl., 60 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2004000798	A1	20031231	WO 2003-EP6483	20030618
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GR, GD, GE, GH, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, MK, MN, MX, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR				
CA 2490121	A1	20031231	CA 2003-2490123	20030618
AU 2003242735	A1	20040106	AU 2003-242735	20030618
AU 2003242735	B2	20070419		
BR 2003011967	A	20050329	BR 2003-11967	20030618
EP 1517887	A1	20050330	EP 2003-760656	20030618
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
CN 1662489	A	20050831	CN 2003-814364	20030618
JP 2005529967	T	20051006	JP 2004-514794	20030618
NZ 537039	A	20070126	NZ 2003-537039	20030618
ZA 2004009580	A	20060628	ZA 2004-9580	20041126
IN 2004CN2828	A	20050210	IN 2004-CN2828	20041214
MX 2004PA12755	A	20050323	MX 2004-PA12755	20041215
US 200522448	A1	20051006	US 2005-518063	20050118
PRIORITY APPL. INFO.:			GB 2002-14117	A 20020619
			WO 2003-EP6483	W 20030618

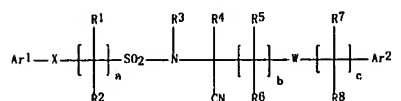
OTHER SOURCE(S): MARPAT 140:59401  
 ABSTRACT:  
 The title compds. R2SO2NRC(CN)R4[(CR5R6)X]nR1 [I: R1 = (un)substituted (hetero)aryl; R2 = alkyl, haloalkyl, cycloalkyl, etc.; R3 = H, alkyl, haloalkyl, etc.; R4-R6 = H, halo, alkyl, etc.; or R4 and R5 together with the carbon atoms to which they are bonded, form an (un)saturated 5-7 membered heterocyclyl having 1-2 heteroatoms selected from N, O and S; X = O, S, SO, SO2; n = 0-1] which have advantageous pesticidal properties, and are suitable, in particular, for the control of parasites in warm-blooded animals (no biol. data), were prepared. Preparation of N-[1-cyano-1-(2,3-dichlorophenoxy)ethyl]-C-phenylmethanesulfonamide is described (no data for intermediates and target compound). Pharmaceutical composition comprising the compound I is claimed.

IT 638207-94-OP  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (use of N-sulfonylaminoacetoneitriles having pesticidal properties)  
 RN 638207-94-0 CAPLUS

L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2004:2844 CAPLUS  
 DOCUMENT NUMBER: 140:59414  
 TITLE: Preparation of α-sulfonylamino-acetonitrile  
 derivatives useful in controlling and preventing the  
 infestation of plants by phytopathogenic  
 microorganisms, particularly fungi  
 INVENTOR(S): Eberle, Martin; Stiller, Daniel; Mueller, Urs  
 PATENT ASSIGNEE(S): Syngenta Participations Ag, Switz.  
 SOURCE: PCT Int. Appl., 87 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2004000797	A1	20031231	WO 2003-EP6482	20030618
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GR, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MC, MK, MN, MW, MX, MY, NZ, OM, ON, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZW				
RW: CH, CN, KE, LS, MW, NZ, SD, SI, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
AU 2003279387	A1	20040106	AU 2003-279387	20030618
EP 1513802	A1	20050316	EP 2003-740286	20030618
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
JP 2005529966	T	20051006	JP 2004-514793	20030618
US 2005234125	A1	20051020	US 2004-517977	20041215
PRIORITY APPL. INFO.:			GB 2002-14116	A 20020619
			WO 2003-EP6482	W 20030618

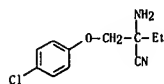
OTHER SOURCE(S): MARPAT 140:59414  
 GRAPHIC IMAGE:



ABSTRACT:  
 The invention relates to α-sulfonylamino-acetonitrile deriva. of the  
 formula I [wherein: Ar1, Ar2 = (un)substituted (hetero)aryl; R1, R2, R5, R6,

L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 R7, R8 = H, (un)substituted alkyl, (un)substituted alk(en/yn)yl, (un)substituted cycloalkyl; R3 = H, alk(en/yn)yl, (un)substituted alkyl; R4 = as given for R1 except H; W = O, S(O)m, NR3; X = direct bond or O, S(O)m, NR3; a, b = 1, 2, 3; c, m = 0, 1, 2. Comps. I possess useful plant protecting properties and may advantageously be employed in agricultural practice for controlling or preventing the infestation of plants by phytopathogenic microorganisms, esp. fungi. In particular, prep.  $\alpha$ -sulfonylamino-acetonitrile I (wherein R1 = R2 = R3 = R5 = R6 = H, R4 = CH3; Ar1 = Ph; Ar2 = p-ClC6H4; W = O; X = direct bond; a, b = 1; c = 0) (II) has shown good fungicidal action against *Plasmopara viticola* on vines, and against *Phytophthora* on tomato and potato plants, at 200 ppm.

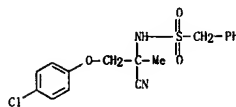
IT 638209-24-2P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (Intermediate: preparation of  $\alpha$ -sulfonylamino-acetonitrile derivs. and their use in preventing or controlling plants infestation by phytopathogenic microorganisms)  
 RN 638209-24-2 CAPLUS  
 CN Butanenitrile, 2-amino-2-[(4-chlorophenoxy)methyl]- (CA INDEX NAME)



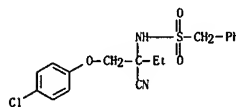
IT 638207-90-6P, 2-(4-Chlorophenoxy)methyl-2-benzylsulfonylamino-propionitrile 638207-91-7P, 2-(4-Chlorophenoxy-methyl)-2-benzylsulfonylamino-butyronitrile 638207-92-8P, 2-(4-Chlorophenoxy)methyl-2-(4-chlorophenylmethylsulfonylamino)-propionitrile 638207-93-9P  
 638207-94-0P 638207-95-1P 638207-96-2P  
 638207-97-3P 638207-98-4P 638207-99-5P  
 638208-00-1P 638208-01-2P 638208-02-3P  
 638208-03-4P 638208-07-8P 638208-09-0P  
 638208-11-4P 638208-13-6P 638208-15-8P  
 638208-17-0P 638208-19-2P 638208-21-6P  
 638208-23-8P 638208-25-0P 638208-27-2P  
 638208-29-4P 638208-31-8P 638208-33-0P  
 638208-35-2P 638208-37-4P 638208-39-6P  
 638208-41-0P 638208-43-2P 638208-45-4P  
 638208-47-6P 638208-49-8P 638208-51-2P  
 638208-52-3P 638208-53-4P 638208-54-5P  
 638208-55-6P 638208-56-7P 638208-57-8P  
 638208-58-9P 638208-59-0P 638208-60-3P  
 638208-61-4P 638208-62-5P 638208-63-6P  
 638208-64-7P 638208-65-8P 638208-66-9P  
 638208-67-0P 638208-68-1P 638208-69-2P  
 638208-70-5P 638208-71-6P 638208-72-7P  
 638208-73-8P 638208-74-9P 638208-76-1P  
 638208-77-2P 638208-78-3P 638208-79-4P  
 638208-80-7P 638208-81-8P 638208-82-9P  
 638208-83-0P 638208-84-1P 638208-85-2P  
 638208-86-3P 638208-87-4P 638208-88-5P  
 638208-89-6P 638208-90-9P 638208-91-0P  
 638208-92-1P 638208-93-2P 638208-94-3P

L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 638208-95-4P 638208-96-5P 638208-98-7P  
 638208-99-8P 638209-01-5P 638209-02-6P  
 638209-03-7P 638209-04-8P 638209-05-9P  
 638209-06-0P 638209-07-1P 638209-08-2P  
 638209-09-3P 638209-10-6P 638209-11-7P  
 638209-12-8P 638209-13-9P 638209-14-0P  
 638209-16-2P 638209-17-3P 638209-18-4P  
 638209-19-5P 638209-20-8P 638209-25-3P  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (prepn. of  $\alpha$ -sulfonylamino-acetonitrile derivs. and their use in preventing or controlling plants infestation by phytopathogenic microorganisms)

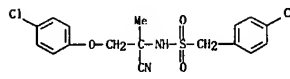
RN 638207-91-7 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)



RN 638207-91-7 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)

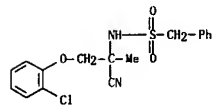


RN 638207-92-8 CAPLUS  
 CN Benzenemethanesulfonamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

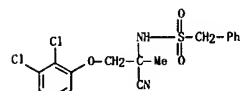


RN 638207-93-9 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

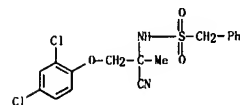
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



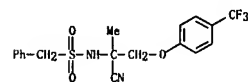
RN 638207-94-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(2,3-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



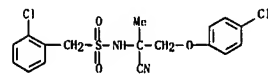
RN 638207-95-1 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



RN 638207-96-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

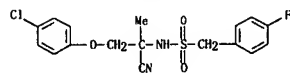


RN 638207-97-3 CAPLUS  
 CN Benzenemethanesulfonamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

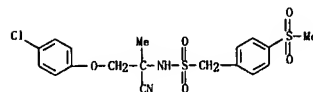


L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

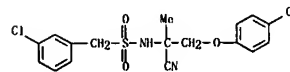
RN 638207-98-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)



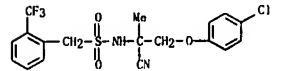
RN 638207-99-5 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-methylsulfonyl- (CA INDEX NAME)



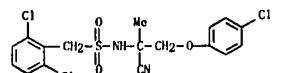
RN 638208-00-1 CAPLUS  
 CN Benzenemethanesulfonamide, 3-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 638208-01-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-(trifluoromethyl)- (CA INDEX NAME)

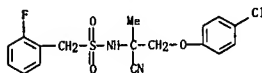


RN 638208-02-3 CAPLUS  
 CN Benzenemethanesulfonamide, 2,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

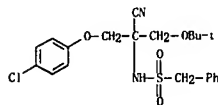


L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

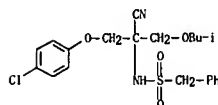
RN 638208-03-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-fluoro- (CA INDEX NAME)



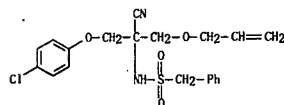
RN 638208-07-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-[(1,1-dimethylethoxy)methyl]ethyl]- (CA INDEX NAME)



RN 638208-09-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-(2-methylpropoxy)methyl]ethyl]- (CA INDEX NAME)



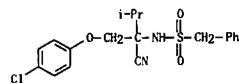
RN 638208-11-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-(2-propenyloxy)methyl]ethyl]- (9CI) (CA INDEX NAME)



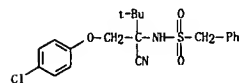
RN 638208-13-6 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-(methoxymethyl)ethyl]- (CA INDEX NAME)



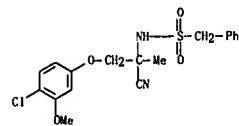
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



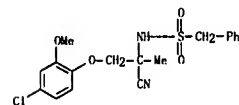
RN 638208-23-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)



RN 638208-25-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-3-methoxyphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

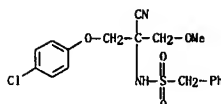


RN 638208-27-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-2-methoxyphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

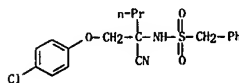


RN 638208-29-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(4-(trifluoromethoxy)phenoxy)ethyl]- (CA INDEX NAME)

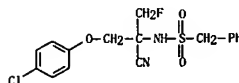
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



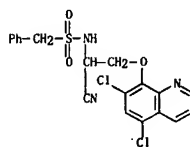
RN 638208-15-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]- (CA INDEX NAME)



RN 638208-17-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chlorophenoxy)-1-cyano-1-(fluoromethyl)ethyl]- (CA INDEX NAME)



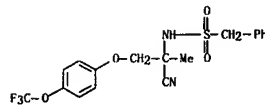
RN 638208-19-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-[(5,7-dichloro-8-quinolinyl)oxy]ethyl]- (CA INDEX NAME)



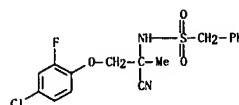
RN 638208-21-6 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



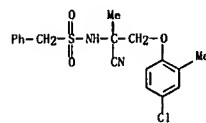
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



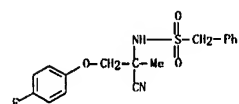
RN 638208-31-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-2-fluorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 638208-33-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-2-methylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

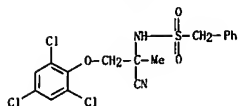


RN 638208-35-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(4-(trifluoromethoxy)phenoxy)ethyl]- (CA INDEX NAME)

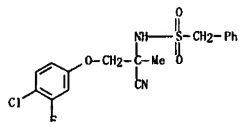


RN 638208-37-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(2,4,6-trichlorophenoxy)ethyl]- (CA INDEX NAME)

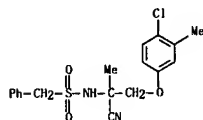
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



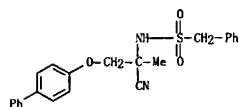
RN 638208-39-6 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-3-fluorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 638208-41-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-3-methylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

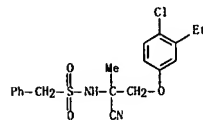


RN 638208-43-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-([1,1'-biphenyl]-4-yloxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

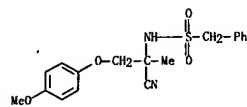


RN 638208-45-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(4-methylphenoxy)ethyl]- (CA INDEX NAME)

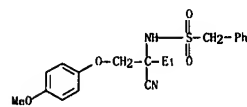
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



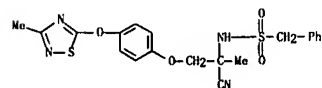
RN 638208-53-4 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-methoxyphenoxy)-1-methylethyl]- (CA INDEX NAME)



RN 638208-54-5 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-(4-methoxyphenoxy)methyl]propyl]- (CA INDEX NAME)

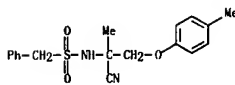


RN 638208-55-6 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(4-[(3-methyl-1,2,4-thiadiazol-5-yl)oxy]phenoxy)ethyl]- (CA INDEX NAME)

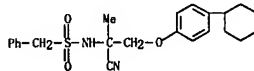


RN 638208-56-7 CAPLUS  
 CN Benzenecetamide, 4-[2-cyano-2-[(phenylmethyl)sulfonyl]amino]propoxy]- (CA INDEX NAME)

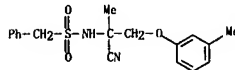
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



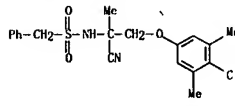
RN 638208-47-6 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-cyclohexylphenoxy)-1-methylethyl]- (CA INDEX NAME)



RN 638208-49-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(3-methylphenoxy)ethyl]- (CA INDEX NAME)

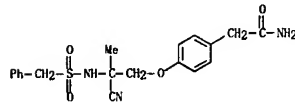


RN 638208-51-2 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-3,5-dimethylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

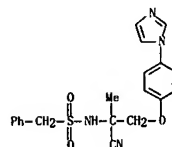


RN 638208-52-3 CAPLUS  
 CN Benzenemethanesulfonamide, N-[2-(4-chloro-3-ethylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

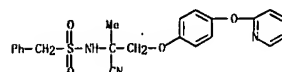
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



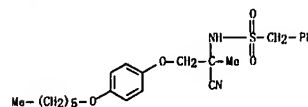
RN 638208-57-8 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-[(1H-imidazol-1-yl)phenoxy]-1-methylethyl]- (CA INDEX NAME)



RN 638208-58-9 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-(4-(2-pyridinyloxy)phenoxy)ethyl]- (CA INDEX NAME)

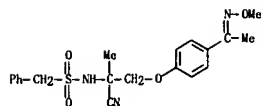


RN 638208-59-0 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-(hexyloxy)phenoxy)-1-methylethyl]- (CA INDEX NAME)

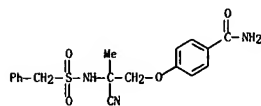


RN 638208-60-3 CAPLUS  
 CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-[(methoxyimino)ethyl]phenoxy)-1-methylethyl]- (CA INDEX NAME)

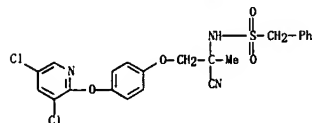
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



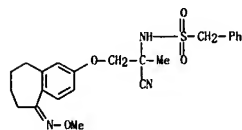
RN 638208-61-4 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(phenylmethyl)sulfonyl]amino]propoxy]-4-(3,5-dichloro-2-pyridinyl)oxy]phenoxy]-1-methylethyl]- (CA INDEX NAME)



RN 638208-62-5 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(3,5-dichloro-2-pyridinyl)oxy]phenoxy]-1-methylethyl]- (CA INDEX NAME)

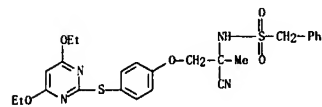


RN 638208-63-6 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(3,5-dichloro-2-pyridinyl)oxy]phenoxy]-1-methylethyl]- (CA INDEX NAME)

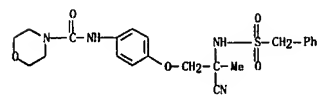


RN 638208-64-7 CAPLUS

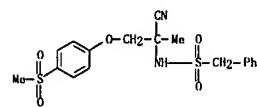
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(4,6-diethoxy-2-pyrimidinyl)thio]phenoxy]-1-methylethyl]- (CA INDEX NAME)



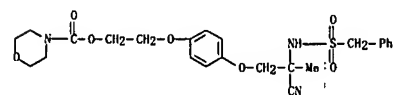
RN 638208-69-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[4-[2-cyano-2-[[[(phenylmethyl)sulfonyl]amino]propoxy]phenyl]- (CA INDEX NAME)



RN 638208-70-5 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(4-methylsulfonyl)phenoxy]ethyl]- (CA INDEX NAME)

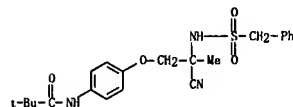


RN 638208-71-6 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 2-[4-[2-cyano-2-[[[(phenylmethyl)sulfonyl]amino]propoxy]phenoxy]ethyl ester (CA INDEX NAME)

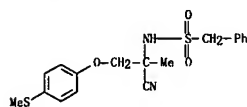


RN 638208-72-7 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(3-cyano-2-pyridinyl)oxy]ethoxy]phenoxy]-1-methylethyl]- (CA INDEX NAME)

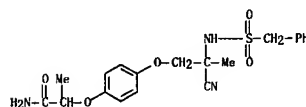
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Propanamide, N-[4-[2-cyano-2-[[[(phenylmethyl)sulfonyl]amino]propoxy]phenyl]-2,2-dimethyl]- (CA INDEX NAME)



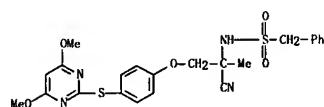
RN 638208-65-8 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(methylthio)phenoxy]ethyl]- (CA INDEX NAME)



RN 638208-66-9 CAPLUS  
 CN Propanamide, 2-[4-[2-cyano-2-[[[(phenylmethyl)sulfonyl]amino]propoxy]phenoxy]- (CA INDEX NAME)

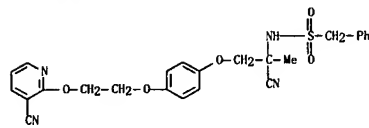


RN 638208-67-0 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-[[[(4,6-dimethoxy-2-pyrimidinyl)thio]phenoxy]-1-methylethyl]- (CA INDEX NAME)

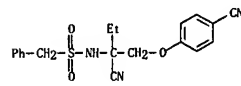


RN 638208-68-1 CAPLUS

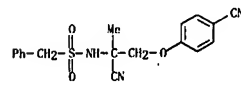
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



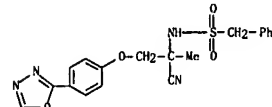
RN 638208-73-8 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-1-[(4-cyanophenoxy)methyl]propyl]- (CA INDEX NAME)



RN 638208-74-9 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-2-(4-cyanophenoxy)-1-methylethyl]- (CA INDEX NAME)

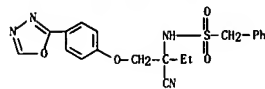


RN 638208-76-1 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(1,3,4-oxadiazol-2-yl)phenoxy]ethyl]- (CA INDEX NAME)

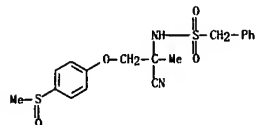


RN 638208-77-2 CAPLUS  
 CN Benzenesulfonamide, N-[1-cyano-1-[[4-(1,3,4-oxadiazol-2-yl)phenoxy]methyl]propyl]- (CA INDEX NAME)

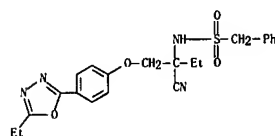
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



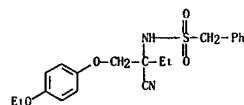
RN 638208-78-3 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(methylsulfinyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 638208-79-4 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(5-ethyl-1,3,4-oxadiazol-2-yl)phenoxy]methyl]propyl]- (CA INDEX NAME)

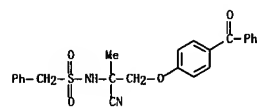


RN 638208-80-7 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(4-ethoxyphenoxy)methyl]propyl]- (CA INDEX NAME)

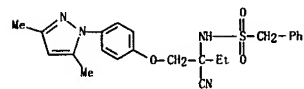


RN 638208-81-8 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(4-ethoxyphenoxy)-1-methylethyl]- (CA INDEX NAME)

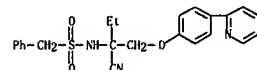
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



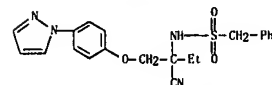
RN 638208-86-3 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(3,5-dimethyl-1H-pyrazol-1-yl)phenoxy]methyl]propyl]- (CA INDEX NAME)



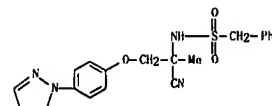
RN 638208-87-4 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(2-pyridinyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



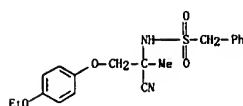
RN 638208-89-5 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(1H-pyrazol-1-yl)phenoxy]methyl]propyl]- (CA INDEX NAME)



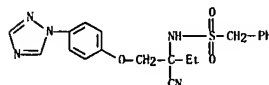
RN 638208-89-6 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(1H-pyrazol-1-yl)phenoxy]ethyl]- (CA INDEX NAME)



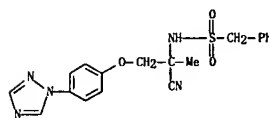
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



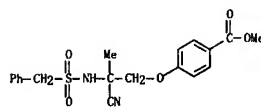
RN 638208-82-9 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(1H-1,2,4-triazol-1-yl)phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 638208-83-0 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(1H-1,2,4-triazol-1-yl)phenoxy]ethyl]- (CA INDEX NAME)



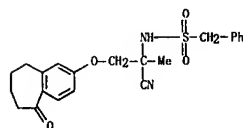
RN 638208-84-1 CAPLUS  
CN Benzoic acid, 4-[2-cyano-2-[(phenylmethyl)sulfonyl]amino]propoxy]-, methyl ester (CA INDEX NAME)



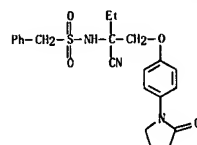
RN 638208-85-2 CAPLUS  
CN Benzenesulfonamide, N-[2-(4-benzoylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

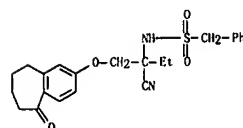
RN 638208-90-9 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[6,7,8,9-tetrahydro-5-oxo-5H-benzocyclohepten-2-yl]oxy]ethyl]- (CA INDEX NAME)



RN 638208-91-0 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[4-(2-oxo-1-pyrrolidinyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

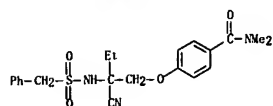


RN 638208-92-1 CAPLUS  
CN Benzenesulfonamide, N-[1-cyano-1-methyl-2-[6,7,8,9-tetrahydro-5-oxo-5H-benzocyclohepten-2-yl]oxy]methyl]propyl]- (CA INDEX NAME)

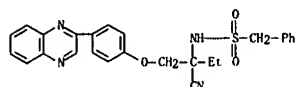


RN 638208-93-2 CAPLUS  
CN Benzamide, 4-[2-cyano-2-[(phenylmethyl)sulfonyl]amino]butoxy]-N,N-dimethyl- (CA INDEX NAME)

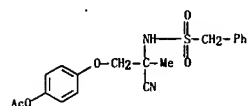
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



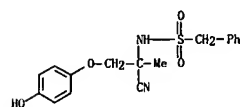
RN 638208-94-3 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(2-quinoxaliny)phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 638208-95-4 CAPLUS  
CN Benzenemethanesulfonamide, N-[2-[4-(acetoxy)phenoxy]-1-cyano-1-methylethyl]- (CA INDEX NAME)

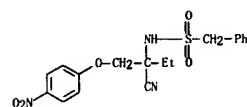


RN 638208-96-5 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-2-(4-hydroxyphenoxy)-1-methylethyl]- (CA INDEX NAME)

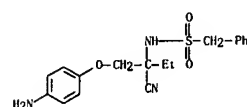


RN 638208-98-7 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-methyl-2-oxo-2H-1-benzopyran-7-yl]oxy]methyl]propyl]- (CA INDEX NAME)

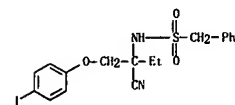
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



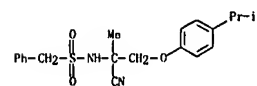
RN 638209-04-8 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-[[4-aminophenoxy]methyl]-1-cyanopropyl]- (CA INDEX NAME)



RN 638209-05-9 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-iodophenoxy]methyl]propyl]- (CA INDEX NAME)

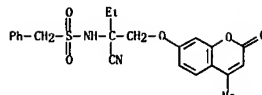


RN 638209-06-0 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-[4-(1-methylethyl)phenoxy]ethyl]- (CA INDEX NAME)

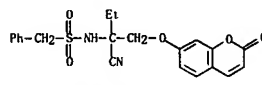


RN 638209-07-1 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(phenylmethoxy)phenoxy]methyl]propyl]- (CA INDEX NAME)

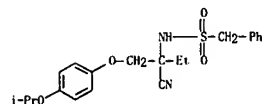
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



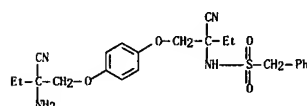
RN 638208-99-8 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[[2-oxo-2H-1-benzopyran-7-yl]oxy]methyl]propyl]- (CA INDEX NAME)



RN 638209-01-5 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(1-methylethoxy)phenoxy]methyl]propyl]- (CA INDEX NAME)

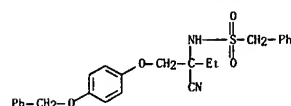


RN 638209-02-6 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-[[4-(2-amino-2-cyanobutoxy)phenoxy]methyl]-1-cyanopropyl]- (CA INDEX NAME)

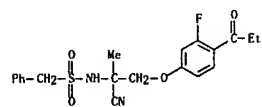


RN 638209-03-7 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-nitrophenoxy]methyl]propyl]- (CA INDEX NAME)

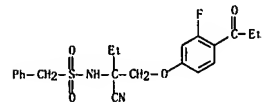
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



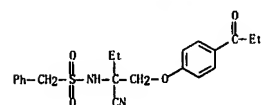
RN 638209-08-2 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-2-[3-fluoro-4-(1-oxopropyl)phenoxy]-1-methylethyl]- (CA INDEX NAME)



RN 638209-09-3 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[3-fluoro-4-(1-oxopropyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



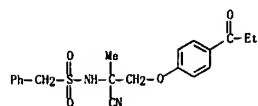
RN 638209-10-6 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(1-oxopropyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



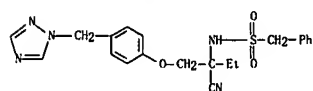
RN 638209-11-7 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-[4-(1-oxopropyl)phenoxy]ethyl]- (CA INDEX NAME)



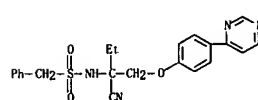
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



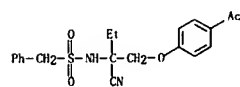
RN 638209-12-8 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(1H-1,2,4-triazol-1-yl)methyl]phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 638209-13-9 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(4-pyrimidinyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

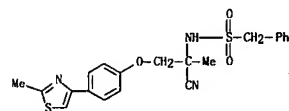


RN 638209-14-0 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(4-acetylphenoxy)methyl]propyl]- (CA INDEX NAME)

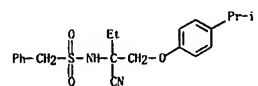


RN 638209-16-2 CAPLUS  
CN Benzenemethanesulfonamide, N-[2-(4-acetylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

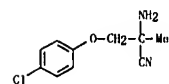


RN 638209-25-3 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(1-methylethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



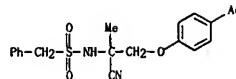
IT 247199-97-9P  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(prereactant: preparation of u-sulfonylamino-acetonitrile derivs. and their use in preventing or controlling plants infestation by phytopathogenic microorganisms)

RN 247199-97-9 CAPLUS  
CN Propanenitrile, 2-amino-3-(4-chlorophenoxy)-2-methyl- (CA INDEX NAME)

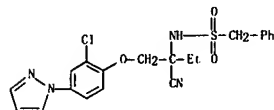


REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

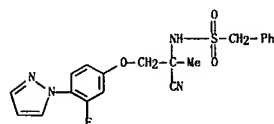
L4 ANSWER 22 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



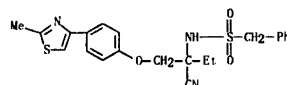
RN 638209-17-3 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[2-chloro-4-(1H-pyrazol-1-yl)phenoxy]methyl]-1-cyanopropyl]- (CA INDEX NAME)



RN 638209-18-4 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-2-[3-fluoro-4-(1H-pyrazol-1-yl)phenoxy]-1-methylethyl]- (CA INDEX NAME)



RN 638209-19-5 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-[[4-(2-methyl-4-thiazolyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 638209-20-8 CAPLUS  
CN Benzenemethanesulfonamide, N-[1-cyano-1-methyl-2-[4-(2-methyl-4-thiazolyl)phenoxy]ethyl]- (CA INDEX NAME)

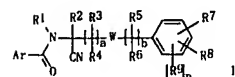
# APPLICANT

L4 ANSWER 23 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2004:2841 CAPLUS  
DOCUMENT NUMBER: 140:59412  
TITLE: Preparation of N-(1-cyano-1-methyl-2-phenoxyethyl) benzamides for controlling parasites  
INVENTOR(S): Ducray, Pierre; Goebel, Thomas  
PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis Pharma G.m.b.H.  
SOURCE: PCT Int. Appl., 54 pp.  
CODEN: P1XXD2  
DOCUMENT TYPE: Patent  
LANGUAGE: English  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2004000793	A2	20031231	WO 2003-EP6490	20030618
WO 2004000793	A3	20040219		
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, MK, MN, MX, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR				
CA 2489842	A1	20031231	CA 2003-2489842	20030618
AU 2003279395	A1	20040106	AU 2003-279395	20030618
AU 2003279395	R2	20070510		
EP 1517885	A2	20050330	EP 2003-740290	20030618
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, IL, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
BR 2003012435	A	20050419	BR 2003-12435	20030618
CN 1668580	A	20050914	CN 2003-817212	20030618
JP 2005529968	T	20051006	JP 2004-514798	20030618
NZ 537665	A	20070727	NZ 2003-537665	20030618
IN 2004CR02869	A	20060217	IN 2004-CN2869	20041216
MX 2004PA12971	A	20050516	MX 2004-PA12971	20041217
ZA 2004010232	A	20050623	ZA 2004-10232	20041220
US 2006128801	A1	20060615	US 2005-518210	20051121
PRIORITY APPL. INFO.:			CH 2002-1047	A 20020619
			WO 2003-EP6490	W 20030618

OTHER SOURCE(S): MARPAT 140:59412  
GRAPHIC IMAGE:



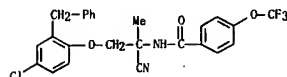
ABSTRACT:  
The title compds. [1: Ar = (un)substituted (hetero)aryl; R1 = H, alkyl, haloalkyl, allyl, alkoxyethyl; R2-R6 = H, halo, alkyl, alkoxy, etc.; or R2 and R3 together = alkylene; R8 = (un)substituted phenylcarbonyl, phenoxyethyl, etc. and R7 = H; or R7 and R8 together = (un)substituted alkylene whereby one or two carbon atoms may be replaced by oxygen; R9 = halo, NO2, CN, alkyl, etc.; W = O, S, SO2, NH, N(alkyl); a = 1-4; b = 0-4; n = 0-3] which have advantageous pesticidal properties, and are especially suitable for controlling parasites on

L4 ANSWER 23 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
warm-blooded animals, were prepd. E.g., a 3-step synthesis of N-[1-cyano-1-methyl-2-(2-benzyl-4-chlorophenoxy)ethyl]-4-(trifluoromethoxy)benzamide (starting from 2-benzyl-4-chlorophenol and chloroacetone), was given. The compds. I were tested in various biol. tests (no data). For example, in vivo test on T. colubriformis and H. contortus on Mongolian gerbils using peroral application showed a vast redn. in nematode infestation (no specific data was given).

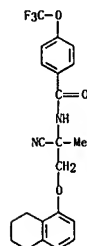
IT 639476-83-8P 639476-84-9P 639476-85-0P  
639476-86-1P

RL: AGR (Agricultural use); BSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
(preparation of N-(1-cyano-1-methyl-2-phenoxyethyl) benzamides for controlling parasites)

RN 639476-83-8 CAPLUS  
CN Benzamide, N-[2-[4-chloro-2-(phenylmethyl)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

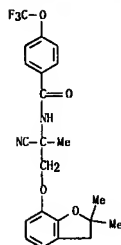


RN 639476-84-9 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[(5,6,7,8-tetrahydro-1-naphthalenyl)oxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

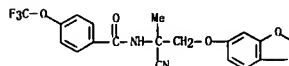


RN 639476-85-0 CAPLUS  
CN Benzamide, N-[1-cyano-2-[(2,3-dihydro-2,2-dimethyl-7-benzofuranyl)oxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

L4 ANSWER 23 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

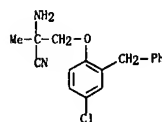


RN 639476-86-1 CAPLUS  
CN Benzamide, N-[2-(1,3-benzodioxol-5-yloxy)-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



IT 639476-88-3P  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(preparation of N-(1-cyano-1-methyl-2-phenoxyethyl) benzamides for controlling parasites)

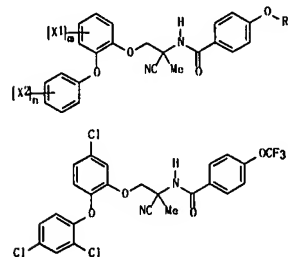
RN 639476-88-3 CAPLUS  
CN Propanenitrile, 2-amino-3-[4-chloro-2-(phenylmethyl)phenoxy]-2-methyl- (CA INDEX NAME)



L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2003:991474 CAPLUS  
DOCUMENT NUMBER: 140:27666  
TITLE: Preparation of amidocetonitrile compounds as pesticides  
INVENTOR(S): Ducey, Pierre; Goebel, Thomas; Bouvier, Jacques  
PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis Pharma G.M.B.H.  
SOURCE: PCT Int. Appl., 41 pp.  
CODEN: P1AXD2  
DOCUMENT TYPE: Patent  
LANGUAGE: English  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003104187	A1	20031218	WO 2003-EP5928	20030605
W: AF, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, ME, MK, MN, MX, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, BG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR				
CA 2480552	A1	20031218	CA 2003-2480552	20030605
AU 2003250342	A1	20031222	AU 2003-250342	20030605
AU 2003250342	B2	20070614		
BR 2003011607	A	20050222	BR 2003-11607	20030605
EP 1513799	A1	20050316	EP 2003-757034	20030605
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
CN 1653039		20050810	CN 2003-810867	20030605
JP 2005528458	T	20050922	JP 2004-511257	20030605
NZ 536442	A	20071026	NZ 2003-536442	20030605
US 2005203178	A1	20050915	US 2004-514300	20041112
US 7304018	B2	20071204		
IN 2004CN02735	A	20060210	IN 2004-CN2735	20041203
MX 2004PA12224	A	20050225	MX 2004-PA12224	20041206
PRIORITY APPLN. INFO.:			CI 2002-965	20020606
OTHER SOURCE(S):			WO 2003-EP5928	20030605
GRAPHIC IMAGE:				

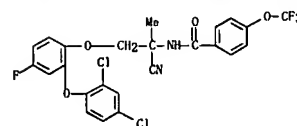


L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

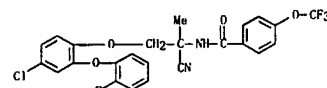
ABSTRACT:  
The title compds. [1: R = alkyl, haloalkyl, alkoxyalkyl, haloalkoxyhaloalkyl; X1, X2 = halo: m = 1-4; n = 1-5] which have advantageous pesticidal properties and are especially suitable for controlling parasites on warm-blooded animals, were prepared and formulated. E.g., a 3-step synthesis of I (starting from 5-chloro-2-(2,4-dichlorophenoxy)phenol and chloroacetone), was given. The compds. I were tested in vivo on Trichostrongylus colubriformis and Haemonchus contortus on Mongolian gerbils. In this test, a vast reduction in nematode infestation is achieved with compds. I (in particular, one of the compds. I effects complete elimination of the nematode infestation at 16 mg/kg).

IT 633305-14-3P 633305-16-5P 633305-17-6P  
633305-18-7P 633305-19-8P 633305-20-1P  
633305-22-3P 633305-23-4P 633305-24-5P  
633305-25-6P 633305-26-7P 633305-27-8P  
633305-28-9P  
RL: AGR (Agricultural use); BSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
(preparation of amidocetonitrile compds. as pesticides)

RN 633305-14-3 CAPLUS  
CN Benzamide, N-[1-cyano-2-[2-(2,4-dichlorophenoxy)-4-fluorophenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

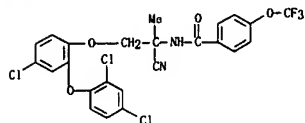


RN 633305-16-5 CAPLUS  
CN Benzamide, N-[2-[4-chloro-2-(2-fluorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

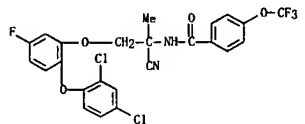


RN 633305-17-6 CAPLUS  
CN Benzamide, N-[2-[4-chloro-2-(2,4-dichlorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

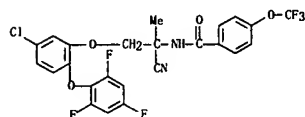
L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



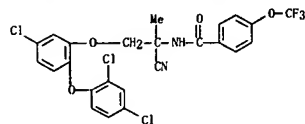
RN 633305-18-7 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[2-(2,4-dichlorophenoxy)-5-fluorophenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



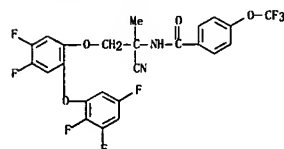
RN 633305-19-8 CAPLUS  
 CN Benzamide, N-[2-[5-chloro-2-(2,4,6-trifluorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



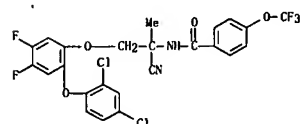
RN 633305-20-1 CAPLUS  
 CN Benzamide, N-[2-[5-chloro-2-(2,4-dichlorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



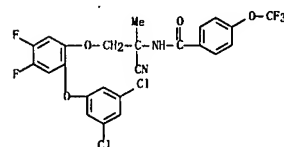
L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



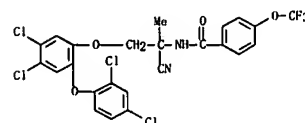
RN 633305-26-7 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[2-(2,4-dichlorophenoxy)-4,5-difluorophenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 633305-27-8 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[2-(3,5-dichlorophenoxy)-4,5-difluorophenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

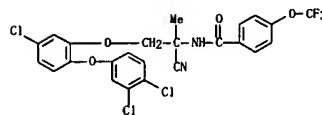


RN 633305-28-9 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[4,5-dichloro-2-(2,4-dichlorophenoxy)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

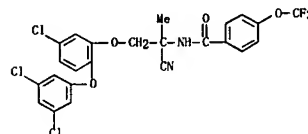


L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

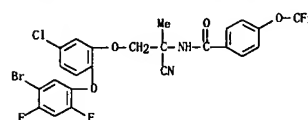
RN 633305-22-3 CAPLUS  
 CN Benzamide, N-[2-[5-chloro-2-(3,4-dichlorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 633305-23-4 CAPLUS  
 CN Benzamide, N-[2-[5-chloro-2-(3,5-dichlorophenoxy)phenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 633305-24-5 CAPLUS  
 CN Benzamide, N-[2-[2-(5-bromo-2,4-difluorophenoxy)-5-chlorophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

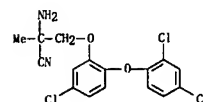


RN 633305-25-6 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(2,3,5-trifluorophenoxy)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

L4 ANSWER 24 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

IT 633305-30-3P, 2-Amino-3-(5-chloro-2-(2,4-dichlorophenoxy)phenoxy)-2-methylpropionitrile  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of amidoacetonitrile compds. as pesticides)

RN 633305-30-3 CAPLUS  
 CN Propanenitrile, 2-amino-3-[5-chloro-2-(2,4-dichlorophenoxy)phenoxy]-2-methyl- (CA INDEX NAME)



REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 25 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2003:931318 CAPLUS

DOCUMENT NUMBER: 140:4857

TITLE: Preparation of substituted benzamides for controlling parasites

INVENTOR(S): Ducray, Pierre; Goebel, Thomas; Bouvier, Jacques;

Durano, Corinne

PATENT ASSIGNEE(S): Novartis Ag, Switz.; Novartis Pharma GmbH

SOURCE: PCT Int. Appl., 56 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

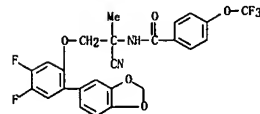
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003097585	A2	20031127	WO 2003-EP5331	20030521
WO 2003097585	A3	20041209		
V: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GR, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, ME, MN, MX, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR				
CA 2486465	A1	20031127	CA 2003-2486465	20030521
AU 2003269601	A1	20031202	AU 2003-269601	20030521
BR 2003011192	A	20050222	BR 2003-11192	20030521
EP 1509494	A2	20050302	EP 2003-740142	20030521
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
CN 1656061	A	20050817	CN 2003-811463	20030521
JP 2005526136	T	20050902	JP 2004-505318	20030521
ZA 2004008738	A	20051031	ZA 2004-8738	20041028
MX 2004PA11532	A	20050214	MX 2004-PA11532	20041119
IN 2004CN02619	A1	20070921	IN 2004-CN2619	20041122
US 200503148	A1	20050915	US 2005-514904	20050105
US 7148255	B2	20061212		

PRIORITY APPLN. INFO.:

OTHER SOURCE(S): MARPAT 140:4857

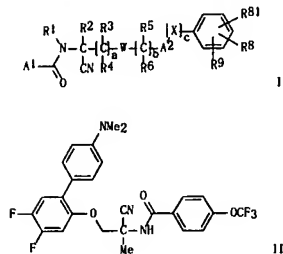
GRAPHIC IMAGE:



L4 ANSWER 25 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 25 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

(Continued)



ABSTRACT:

The title compds. [I]: A1, A2 = (un)substituted aryl, heteroaryl; R1 = H, alkyl, haloalkyl, allyl, alkoxyalkyl; R2-R6 = H, halo, alkyl, etc.; or R2 and R3 together = alkylene; R7 = H, alkyl; either R8 = alkylamino, dialkylamino, cycloalkyl, etc. and R81 = H, R9; or R8 and R81 together (un)substituted alkylene (whereby one or two carbon atoms may be replaced by O, N or S); R9 = halo, NO2, CN, alkyl, etc.; W = O, S, SO2, NR7; X = O, NR7; a = 1-4; b = 0-4; c = 0-1, which have advantageous pesticidal properties, and are especially suitable for controlling parasites on warm-blooded animals (no biol. data given), were prepared and formulated. E.g., a multi-step synthesis of II, starting from chloroacetone and 2-bromo-4,5-difluorophenol, was given.

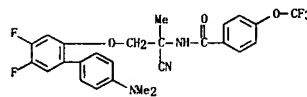
IT

627873-93-2P 627873-94-3P  
RL: AGP (Agricultural use); RSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted benzamides for controlling parasites)

RN 627873-93-2 CAPLUS

CN Benzamide, N-[1-cyano-2-[[4'-(dimethylamino)-4,5-difluoro[1,1'-biphenyl]-2-yl]oxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 627873-94-3 CAPLUS

CN Benzamide, N-[2-[2-(1,3-benzodioxol-5-yl)-4,5-difluorophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

L4 ANSWER 26 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2003:931161 CAPLUS

DOCUMENT NUMBER: 140:4955

TITLE: Preparation of N-acylaminoacetone nitriles for

controlling parasites

INVENTOR(S): Ducray, Pierre; Goebel, Thomas; Bouvier, Jacques;

Durano, Corinne

PATENT ASSIGNEE(S): Novartis Ag, Switz.; Novartis Pharma GmbH

SOURCE: PCT Int. Appl., 64 pp.

CODEN: PIXXD2

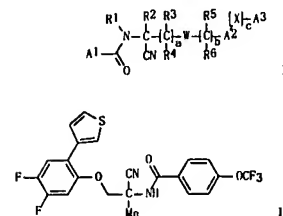
DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003097036	A1	20031127	WO 2003-EP5334	20030521
V: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GR, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, ME, MN, MX, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR				
CA 2483286	A1	20031127	CA 2003-2483286	20030521
AU 2003242555	A1	20031202	AU 2003-242555	20030521
BR 2003011214	A	20050301	BR 2003-11214	20030521
EP 1509221	A1	20050302	EP 2003-752774	20030521
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
CN 1649579	A	20050803	CN 2003-809965	20030521
JP 2005536466	T	20051202	JP 2004-505035	20030521
NZ 536184	A	20061027	NZ 2003-536184	20030521
ZA 2004007974	A	20060726	ZA 2004-7974	20041004
US 2005182127	A1	20050816	US 2004-513806	20041108
MX 2004PA11531	A	20050214	MX 2004-PA11531	20041119
IN 2004CN02610	A	20070921	IN 2004-CN2610	20041122
PRIORITY APPLN. INFO.:				
OTHER SOURCE(S): MARPAT 140:4955				
GRAPHIC IMAGE:				



L4 ANSWER 26 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

## ABSTRACT:

The title compds. [1; A1, A2 = (un)substituted aryl, heteroaryl, etc.; A3 = (un)substituted pyrimidinyl, s-triazinyl, 1,2,4-triazinyl, etc.; R1 = H, alkyl, haloalkyl, allyl, alkoxyethyl; R2-R6 = H, halo, alkyl, etc.; or R2 and R3 are jointly alkylene; W = O, S, SO<sub>2</sub>, NR7; X = O, S, NR7; R7 = H, alkyl; a = 1-4; b = 0-4; c = 0-1] which have advantageous pesticidal properties, and are particularly suitable for controlling parasites in warm-blooded animals, were prepared and formulated. E.g., a multi-step synthesis of the benzamide [1, starting from chloroacetone and 2-bromo-4,5-difluorophenol, was given.

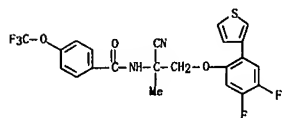
IT 627881-34-9P 627881-35-0P 627881-36-1P

627881-37-2P 627881-38-3P 627881-39-4P

RL: AGR (Agricultural use); BSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of N-acylaminoacetone nitriles for controlling parasites)

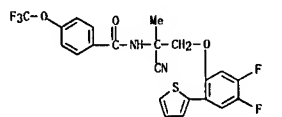
RN 627881-34-9 CAPLUS

CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(3-thienyl)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 627881-35-0 CAPLUS

CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(2-thienyl)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)

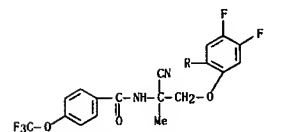


RN 627881-36-1 CAPLUS

CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(4-methyl-2-thienyl)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



L4 ANSWER 26 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

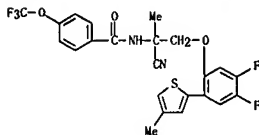


REFERENCE COUNT:

7

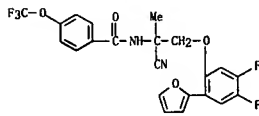
THERE ARE 7 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 26 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



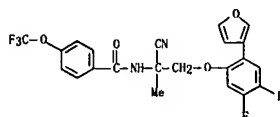
RN 627881-37-2 CAPLUS

CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(2-furanyl)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 627881-38-3 CAPLUS

CN Benzamide, N-[1-cyano-2-[4,5-difluoro-2-(3-furanyl)phenoxy]-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 627881-39-4 CAPLUS

CN Benzamide, N-[2-(2-benzo[b]thien-3-yl)-4,5-difluorophenoxy]-1-cyano-1-methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2003/841853 CAPLUS

DOCUMENT NUMBER: 140:87061

TITLE: N-Arylamino nitriles as bioavailable peptidomimetic inhibitors of cathepsin B  
AUTHOR(S): Greenspan, Paul D.; Clark, Kirk L.; Cowen, Scott D.; McQuire, Leslie W.; Tommasi, Ruben A.; Farley, David L.; Quodros, Elizabeth; Coppa, David E.; Du, Zengming; Fang, Zheng; Zhou, Huanghai; Doughty, John; Toscano, Karen T.; Wigg, Andrew M.; Zhou, Siyuan

CORPORATE SOURCE: Novartis Institute of Biomedical Research, East Hanover, NJ, 07936, USA

SOURCE: Bioorganic & Medicinal Chemistry Letters (2003), 13(22), 4121-4124

CODEN: BWACLE; ISSN: 0960-894X

PUBLISHER: Elsevier Science B.V.

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 140:87061

## ABSTRACT:

To improve the pharmacokinetics of a previously reported series of dipeptidyl nitrile cathepsin B inhibitors, the P2-P3 amide group was replaced with an arylamine. Further optimization of this template resulted in highly potent and selective inhibitors with excellent oral availability.

IT 374118-06-6P 374118-08-8P 374118-11-3P

374118-13-5P 374118-16-8P 374118-45-3P

374118-46-4P 374118-49-7P 374118-61-3P

374118-69-1P 374118-72-6P 374118-73-7P

374118-74-8P 374118-75-9P 374118-76-0P

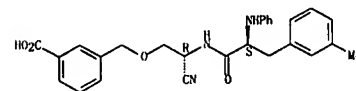
374118-82-8P 645394-51-0P

RL: PAC (Pharmacological activity); PKT (Pharmacokinetics); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation and structure-activity relationship of N-arylamino nitriles as bioavailable peptidomimetic inhibitors of cathepsin B)

RN 374118-06-6 CAPLUS

CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

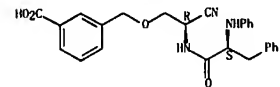
Absolute stereochemistry.



RN 374118-08-8 CAPLUS

CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

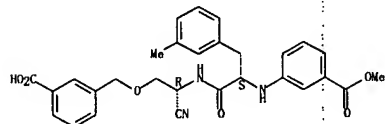
Absolute stereochemistry.



L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

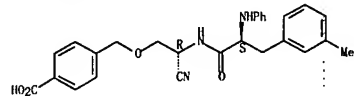
RN 374118-11-3 CAPLUS  
 CN Benzoic acid, 3-[[[(1R)-2-[(3-carboxyphenyl)methoxy]-1-cyanoethyl]amino]-1-(3-methylphenyl)methyl]-2-oxoethyl]amino]-, 1-methyl ester (CA INDEX NAME)

Absolute stereochemistry.



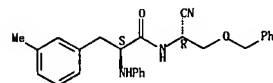
RN 374118-13-5 CAPLUS  
 CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-16-8 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-3-methyl-α-(phenylamino)-, (αS)- (CA INDEX NAME)

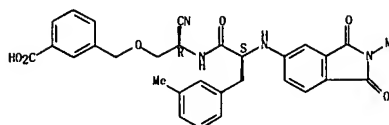
Absolute stereochemistry.



RN 374118-45-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(2,3-dihydro-2-methyl-1,3-dioxo-1H-isindol-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

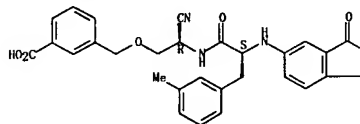
Absolute stereochemistry.

L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



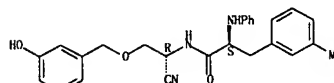
RN 374118-46-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(2,3-dihydro-3-oxo-1H-inden-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-49-7 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-[(3-hydroxyphenyl)methoxy]ethyl]-3-methyl-α-(phenylamino)-, (αS)- (CA INDEX NAME)

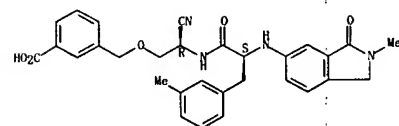
Absolute stereochemistry.



RN 374118-61-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(2,3-dihydro-2-methyl-3-oxo-1H-isindol-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

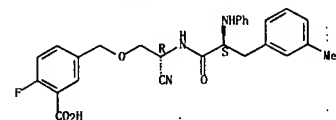
Absolute stereochemistry.

L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



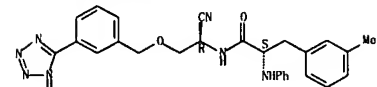
RN 374118-69-1 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.



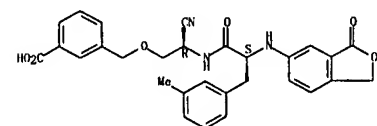
RN 374118-72-6 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-[[3-(1H-tetrazol-5-yl)phenyl]methoxy]ethyl]-3-methyl-α-(phenylamino)-, (αS)-(9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-73-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

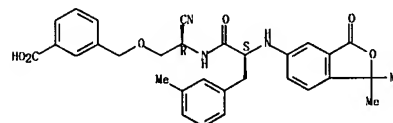
Absolute stereochemistry.



L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

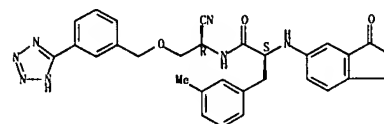
RN 374118-74-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(1,3-dihydro-1,1-dimethyl-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



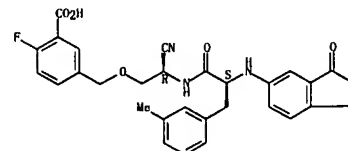
RN 374118-75-9 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-[[3-(1H-tetrazol-5-yl)phenyl]methoxy]ethyl]-α-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-methyl-, (αS)-(9CI) (CA INDEX NAME)

Absolute stereochemistry.



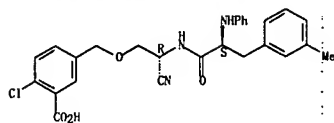
RN 374118-76-0 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[(2S)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.



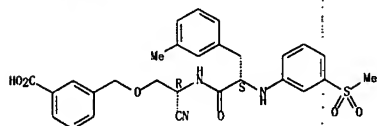
RN 374118-82-8 CAPLUS  
 CN Benzoic acid, 2-chloro-5-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 27 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
Absolute stereochemistry.



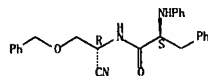
RN 645394-51-0 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[[3-(methylsulfonyl)phenyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



IT 645394-49-6DP, derivs.  
RL: SPN (Synthetic preparation); PREP (Preparation)  
(preparation and structure-activity relationship of N-arylamino nitriles as bioavailable peptidomimetic inhibitors of cathepsin B)  
RN 645394-49-6 CAPLUS  
CN Benzene propanamide, N-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-α-(phenylamino)-, (αS)- (CA INDEX NAME)

Absolute stereochemistry.

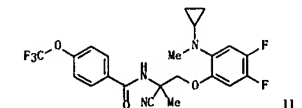
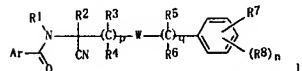


REFERENCE COUNT: 10 THERE ARE 10 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 28 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
ACCESSION NUMBER: 2003:570944 CAPLUS  
DOCUMENT NUMBER: 139:133350  
TITLE: Amidoacetonitrile derivatives useful as parasitocides, and their preparation, compositions, and use  
INVENTOR(S): Ducray, Pierre; Goebel, Thomas; Fruechtel, Joerg; Bouvier, Jacques; Flum, Gabriela  
PATENT ASSIGNEE(S): Novartis Ag, Swiss; Novartis Pharma GmbH  
SOURCE: PCT Int. Appl., 50 pp.  
CODEN: P1XXD2  
DOCUMENT TYPE: Patent  
LANGUAGE: English  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003059868	A1	20030724	WO 2003-EP498	20030120
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, ME, MK, MN, MX, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SE, SG, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VC, VN, YU, ZA, ZW				
RW: AM, AZ, BY, BG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, SE, SI, SK, TR				
CA 2468423	A1	20030724	CA 2003-2468423	20030120
AU 2003202580	A1	20030730	AU 2003-202580	20030120
EP 1470103	A1	20041027	EP 2003-701531	20030120
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
BR 2003007011	A	20041103	BR 2003-7011	20030120
CN 1602296	A	20050330	CN 2003-801730	20030120
JP 200514453	T	20050519	JP 2003-559972	20030120
NZ 533964	A	20060224	NZ 2003-533964	20030120
ZA 2004003851	A	20050810	ZA 2004-3851	20040519
US 2005059736	A1	20050317	US 2004-501495	20040714
US 7153814	B2	20061226		
IN 2004CN01580	A	20060224	IN 2004-CN1580	20040716
MX 2004PA07048	A	20041011	MX 2004-PA07048	20040721
PRIORITY APPL. INFO.:			CH 2002-97	A 20020121
OTHER SOURCE(S):		MARPAT 139:133350	WO 2003-EP498	W 20030120
GRAPHIC IMAGE:				

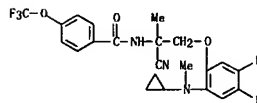
L4 ANSWER 28 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



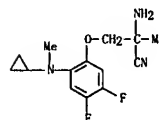
ABSTRACT:  
The invention relates to compds. I [in which R1 = H, alkyl, haloalkyl, cyanoalkyl, alkoxyethyl, or benzyl; R2, R3, R4, R5, R6 = H, halo, unsubstituted or mono- or polyhalogenated alk(en/yn)yl, (un)substituted alkoxy, haloalkoxy, cycloalkyl, or phenyl; or R2R3 = C2-6 alkylene; R7 = (un)substituted cycloalkyl, cycloalkylthio, or (cycloalkyl)(R9)N, in which the substituents are halo, alkyl, heteroalkyl, or heteroalkoxy; R8 = halo, NO2, cyano, (halo)alk(en)yl, (halo)alkoxy, alkynyl, cycloalkyl, alkenyloxy, haloalkenyloxy, alkylthio, haloalkylthio, alkylsulfonyloxy, haloalkylsulfonyloxy, alkylsulfinyl, haloalkylsulfinyl, alkylsulfonyl, haloalkylsulfonyl, alkenylthio, haloalkenylthio, (un)substituted Ph, PhO, PhNH, PhCO, PhCH(OH), etc.; or R7R8 = C2-5 alkylene; Ar = (un)substituted Ph, heteroalkyl, naphthyl, or quinolyl (substituents as given for R7, R8); R9 = H, alkyl, haloalkyl, allyl, alkoxyethyl, or COR10; R10 = alkyl, haloalkyl, or alkoxyethyl; W = O, S, SO2, or N(R11); R11 = H or alkyl; p = 1, 2, 3, or 4; q = 0, 1, 2, 3, or 4; and n = 0-2; in which, if R7 = heteroalkoxy, the heteroalkyl group in R7 is other than pyridyl; including enantiomers]. Compds. I have advantageous pesticidal properties, and are particularly suitable for controlling parasites in warm-blooded animals. A list of 120 possible specific compds. I is given, and one of these (II) is prepared and claimed per se. Claims include pharmaceutical and agrochem. compns., as well as use of I to control parasites. Thus, II was prepared in 6 steps: (1) Pd-catalyzed amination of 2-bromo-4,5-difluorobenzonitrile with cyclopropylamine; (2) N-methylation of the secondary amino product using MeI and MeI in DMF; (3) demethylation of the anisole methoxy group using BBr3; (4) etherification of the resultant phenol with chloroacetone using K2CO3 and KI; (5) aminocyanation of the ketone with NaCN and NH4Cl in aqueous NH3; and (6) amidation of the amino group with 4-(CF3)C6H4COCl and DMAP in CH2Cl2. II was active against the nematodes *Trichostrongylus colubriformis* and *Haemonchus contortus* in Mongolian gerbils, by peroral administration at doses in the range of 0.01 to 100 mg/kg. Tests for action against various ecto- and endo-parasitic insects and acarids, namely *Lucilia sericata*, *Boophilus microplus*, *Amblyomma hebraeum*, *Dermanyssus gallinae*, and *Musca domestica*, are described. Preferred formulations include granules, tablets, boluses, injectables, and pour-ons.

IT 565470-08-8P, N-[2-Cyano-1-[[2-(N-cyclopropyl-N-methylamino)-4,5-difluorophenoxy]prop-2-yl]-4-(trifluoromethoxy)benzamide  
RL: AGR (Agricultural use); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
(parasiticide; preparation of aromatic amidoacetonitrile deriva. as parasitocides)  
RN 565470-08-8 CAPLUS  
CN Benzamide, N-[[1-cyano-2-[[2-(cyclopropylmethylanino)-4,5-difluorophenoxy]-1-

L4 ANSWER 28 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
methylethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



IT 565470-16-8P, 2-Amino-2-[[2-(N-cyclopropyl-N-methylamino)-4,5-difluorophenoxy]methyl]propionitrile  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(preparation of aromatic amidoacetonitrile deriva. as parasitocides)  
RN 565470-16-8 CAPLUS  
CN Propenitrile, 2-amino-3-[[2-(cyclopropylmethylanino)-4,5-difluorophenoxy]-2-methyl]- (CA INDEX NAME)



REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2003:282525 CAPLUS  
 DOCUMENT NUMBER: 138:287981  
 TITLE: Preparation of peptide nitriles useful as reversible inhibitors of cysteine proteases  
 INVENTOR(S): Bekkali, Younes; Hickey, Eugene R.; Liu, Weimin; Patel, Usha R.; Spero, Denise Mary; Sun, Sanxing; Thomson, David S.; Ward, Vancey D.; Young, Erick R.  
 PATENT ASSIGNEE(S): Boehringer Ingelheim Pharmaceuticals, Inc., USA  
 SOURCE: PCT Int. Appl., 291 pp.  
 CODEN: P1XXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

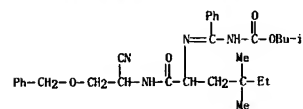
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003029200	A2	20030410	WO 2002-US30644	20020927
WO 2003029200	A3	20031113		
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TN, TR, TT, TZ, UA, UG, UZ, VC, VN, YU, ZA, ZM, ZW			
RW:	GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, FI, FR, GB, GR, IE, IT, LJ, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
CA 2459825	A1	20030410	CA 2002-2459825	20020927
AU 2002340031	A1	20030414	AU 2002-340031	20020927
US 2004063679	A1	20040401	US 2002-256512	20020927
US 6936606	B2	20050830		
EP 1434769	A2	20040707	EP 2002-778364	20020927
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK			
JP 2005504827	T	20050217	JP 2003-532454	20020927
PRIORITY APPL. INFO:			US 2001-326538P	P 20011002
			WO 2002-US30644	W 20020927

OTHER SOURCE(S): MARPAT 138:287981

ABSTRACT:  
 R6N:CR1NR4CR2R3C(X)NR4CR5R9CN or R6R8NCR1:NCR2R3C(X)NR4CR5R9CN [R1 is a bond, H, (un)substituted alkyl, alkoxy, aryloxy, cycloalkyl, cycloalkyloxy, aryl, benzyl, tetrahydronaphthyl, indenyl, indenyl, alkylsulfonylalkyl, cycloalkylsulfonylalkyl, arylsulfonylalkyl, heterocyclyl or heterocyclyloxy; R2 is H or alkyl; R3 is a bond, H, (un)substituted (hetero)alkyl, alkylene, heterocyclylalkyl, cycloalkyl, arylalkyl or aryl; or CR2R3 is a nonarom. cycloalkyl or heterocyclic ring; R4 is H, OH or alkyl; R5 is H, alkyl, alkoxy, alkoxyalkyl or arylalkyl; R6 is H, OH, CN or (un)substituted; or R1 and R6 form a ring; R7 is H, (un)substituted (hetero)alkyl; R9 is H, (un)substituted (hetero) (cyclo)alkyl, heteroaryl or cyano; or CR5R9 is a ring] were prepared as novel cathepsin S, K, F, L and B reversible inhibitors for treating autoimmune and other diseases. Thus, [[1-(1-cyanocyclopentyl)carbamoyl]-3,3-dimethylbutylamino]morpholin-4-ylmethylene]carbamate 1-propylpiperidin-4-yl ester was prepared by a multistep procedure including amidation reactions. Comps. of the invention showed IC50 values  $\leq 100$  micromolar for inhibition of cathepsins S, K, F, L and B.

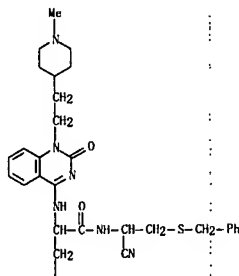
IT 507264-87-IP 507264-98-4P 507264-99-5P  
 507265-00-1P 507265-40-9P 507265-43-2P

L4 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



RN 507265-40-9 CAPLUS  
 CN Cyclohexanepropanamide, N-[1-cyano-2-[(phenylmethyl)thio]ethyl]- $\alpha$ -[[1,2-dihydro-1-[2-(1-methyl-4-piperidinyl)ethyl]-2-oxo-4-quinazolinyl]amino]-4,4-diethyl- (CA INDEX NAME)

PAGE 1-A



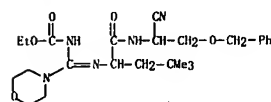
PAGE 2-A



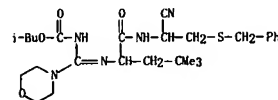
RN 507265-43-2 CAPLUS  
 CN Cyclohexanepropanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]- $\alpha$ -[[1,2-dihydro-1-[2-(4-methyl-1-piperazinyl)ethyl]-2-oxo-4-quinazolinyl]amino]- (CA INDEX NAME)

L4 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

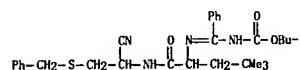
507265-54-5P 507265-61-4P 507265-62-5P  
 507265-63-6P 507265-64-7P  
 RL: PAC (Pharmacological activity): SPN (Synthetic preparation): THU (Therapeutic use): BIOL (Biological study): PREP (Preparation): USES (Uses)  
 (prepn. of peptide nitriles useful as reversible inhibitors of cysteine proteases)  
 RN 507264-87-1 CAPLUS  
 CN 10-Oxa-2,4,7-triazadec-2-enoic acid, 8-cyano-5-(2,2-dimethylpropyl)-3-(4-morpholinyl)-6-oxo-11-phenyl-, ethyl ester (9C1) (CA INDEX NAME)



RN 507264-98-4 CAPLUS  
 CN 10-Thia-2,4,7-triazadec-2-enoic acid, 8-cyano-5-(2,2-dimethylpropyl)-3-(4-morpholinyl)-6-oxo-11-phenyl-, 2-methylpropyl ester (9C1) (CA INDEX NAME)



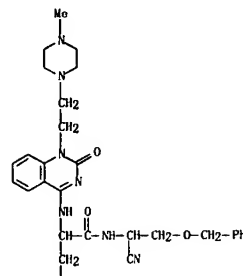
RN 507264-99-5 CAPLUS  
 CN 10-Thia-2,4,7-triazadec-2-enoic acid, 8-cyano-5-(2,2-dimethylpropyl)-6-oxo-3,11-diphenyl-, 2-methylpropyl ester (9C1) (CA INDEX NAME)



RN 507265-00-1 CAPLUS  
 CN 10-Oxa-2,4,7-triazadec-2-enoic acid, 8-cyano-5-(2,2-dimethylbutyl)-6-oxo-3,11-diphenyl-, 2-methylpropyl ester (9C1) (CA INDEX NAME)

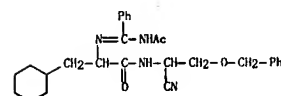
L4 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

PAGE 1-A

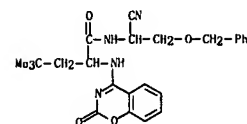


PAGE 2-A

RN 507265-54-5 CAPLUS  
 CN Cyclohexanepropanamide,  $\alpha$ -[[1-(acetylaminophenyl)methylene]amino]-N-[1-cyano-2-(phenylmethoxy)ethyl]- (CA INDEX NAME)



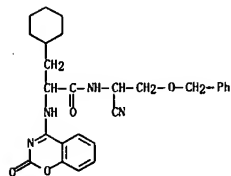
RN 507265-61-4 CAPLUS  
 CN Pentanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-4,4-dimethyl-2-[(2-oxo-2H-1,3-benzoxazin-4-yl)amino]- (CA INDEX NAME)



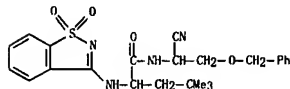


L4 ANSWER 29 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

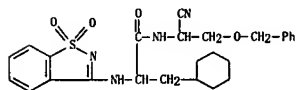
RN 507265-62-5 CAPLUS  
 CN Cyclohexanepropanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-ω-[(2-oxo-2H-1,3-benzoxazin-4-yl)amino]- (CA INDEX NAME)



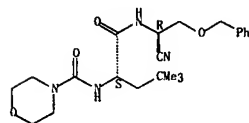
RN 507265-63-6 CAPLUS  
 CN Pentenamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-2-[(1,1-dioxido-1,2-benzisothiazol-3-yl)amino]-4,4-dimethyl- (CA INDEX NAME)



RN 507265-64-7 CAPLUS  
 CN Cyclohexanepropanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-ω-[(1,1-dioxido-1,2-benzisothiazol-3-yl)amino]- (CA INDEX NAME)

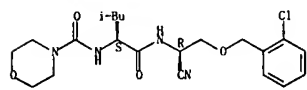


L4 ANSWER 30 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 Absolute stereochemistry.



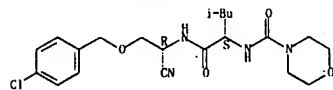
RN 290816-82-9 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-[(2-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



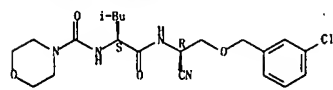
RN 290816-83-0 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-[(4-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-89-6 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-[(3-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-91-0 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(2-methylphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 30 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

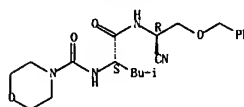
ACCESSION NUMBER: 2003:55370 CAPLUS  
 DOCUMENT NUMBER: 140:5280  
 TITLE: Design and synthesis of dipeptide nitriles as reversible and potent Cathepsin S inhibitors. [Erratum to document cited in CA138:56234]  
 AUTHOR(S): Ward, Yancey D.; Thomson, David S.; Frye, Leah L.; Cywin, Charles L.; Korwick, Tina; Emanuel, Michel J.; Zindell, Renee; McNeill, Daniel; Bokkai, Younes; Girardot, Marc; Hrapchak, Matt; DeFuri, Molly; Crane, Kathy; White, Della; Pav, Susan; Wang, Yong; Hao, Ming-Hong; Grygon, Christine A.; Labadie, Mark E.; Freeman, Dorothy M.; Davidson, Walter; Hopkins, Jerry L.; Brom, Maryanne L.; Spero, Denise M.  
 CORPORATE SOURCE: Boehringer Ingelheim Pharmaceuticals, Ridgefield, CT, 06877-0368, USA  
 SOURCE: Journal of Medicinal Chemistry (2003), 46(5), 882  
 CODEN: JMCMAR; ISSN: 0022-2623  
 PUBLISHER: American Chemical Society  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English

ABSTRACT: The name of author Marc Girardot was incorrect in the version published on the Web 10/31/2002 (ASAP) and in the Dec. 5, 2002 issue (Volume 45, Number 25, pp 5471-5482). The correct electronic version of the manuscript was published on 01/20/2003.

IT 290816-77-2P  
 RL: BSU (Biological study, unclassified); PRP (Properties); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)  
 (preparation and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors (Erratum))

RN 290816-77-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

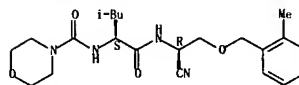
Absolute stereochemistry.



IT 290816-78-3P 290816-82-9P 290816-83-0P  
 290816-89-6P 290816-91-0P 290817-02-6P  
 479091-65-1P 479091-66-2P 479091-67-3P  
 479091-70-8P 479091-71-9P 479091-72-0P  
 479091-73-1P  
 RL: BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)  
 (preparation and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors (Erratum))

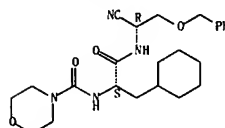
RN 290816-78-3 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

L4 ANSWER 30 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



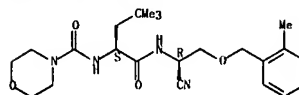
RN 290817-02-6 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



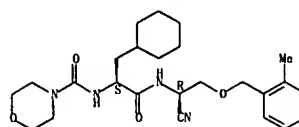
RN 479091-65-1 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(2-methylphenyl)methoxy]ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 479091-66-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(2-methylphenyl)methoxy]ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

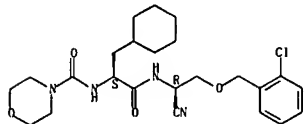
Absolute stereochemistry.



RN 479091-67-3 CAPLUS

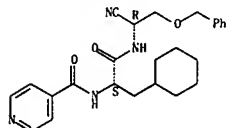
L4 ANSWER 30 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 CN 4-Morpholinecarboxamide, N-[(1S)-2-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



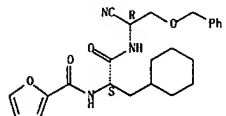
RN 479091-70-8 CAPLUS  
 CN 4-Pyridinecarboxamide, N-[(1S)-2-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 479091-71-9 CAPLUS  
 CN 2-Furancarboxamide, N-[(1S)-2-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.

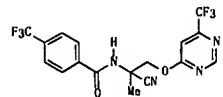
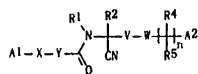


RN 479091-72-0 CAPLUS  
 CN 2-Thiophenecarboxamide, N-[(1S)-2-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 31 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2003:42252 CAPLUS  
 DOCUMENT NUMBER: 138:106707  
 TITLE: Preparation of pesticidally active aminoacetonitriles  
 INVENTOR(S): Sieiger, Arthur; Eberle, Martin; Renold, Peter; O'Sullivan, Anthony; Cornelius, Zambach, Werner  
 PATENT ASSIGNEE(S): Syngenta Participations AG, Swiss.  
 SOURCE: PCT Int. Appl., 58 pp.  
 COVEN: PAXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

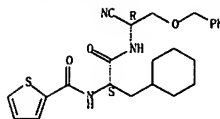
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003004474	A1	20030116	WO 2002-EP7515	20020705
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MZ, NA, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW			
RW:	GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, ML, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, CA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
AU 2002325871	A1	20030121	AU 2002-325871	20020705
PRIORITY APPLN. INFO.:			CH 2001-1251	A 20010706
OTHER SOURCE(S):			WO 2002-EP7515	W 20020705
GRAPHIC IMAGE:				



#### ABSTRACT:

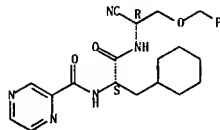
The title compds. [I: A1, A2 = (un)substituted aryl or heteroaryl bonded via a ring carbon atom; X, Y = a bond, alkylene, alkenylene, phenylene, etc.; R1 = H, alkyl, haloalkyl; R2 = alkyl, haloalkyl, alkoxyalkyl, etc.; V = alkylene, alkenylene, alkenylene, etc.; W = O, S, SO, SO2, NR3; R3 = H, alkyl, C(O)-alkyl, alkyl-C(O)-alkyl; n = 0-1; when n = 1, R4, R5 = H, alkyl, haloalkyl; with the proviso(s) and their salts, useful in controlling pests, were prepared. Thus, amidation of 2-amino-3-hydroxy-2-methylpropionitrile with 4-trifluoromethylbenzoyl chloride followed by reacting the resulting amide with 4-chloro-6-trifluoromethylpyrimidine afforded II which showed an activity of more than 80% against *Aphis craccivora* *Diuraphis brassicae*, *Spodoptera*

L4 ANSWER 30 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



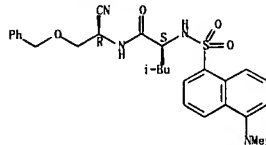
RN 479091-73-1 CAPLUS  
 CN Pyrazinecarboxamide, N-[(1S)-2-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



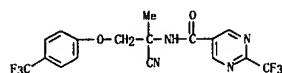
IT 290816-90-9P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors (Erratum))  
 RN 290816-90-9 CAPLUS  
 CN Pentanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-[[[5-(dimethylamino)-1-naphthalenyl]sulfonyl]amino]-4-methyl-, (2S)- (CA INDEX NAME)

Absolute stereochemistry.



L4 ANSWER 31 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 littoralis and Tetranychus urticae.

IT 487015-51-OP  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of (hetero)aryloxymethyl substituted aminoacetonitriles as pesticides)  
 RN 487015-51-0 CAPLUS  
 CN 5-Pyrimidinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(trifluoromethyl)- (CA INDEX NAME)



REFERENCE COUNT: 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

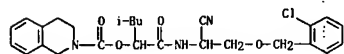
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN  
 ACCESSION NUMBER: 2002:964345 CAPLUS  
 DOCUMENT NUMBER: 138:24952  
 TITLE: Preparation of novel amino nitriles useful as reversible inhibitors of cysteine proteases  
 Hickey, Eugene R.; Bekkali, Younes; Patel, Usha R.; Spero, Denise M.; Thomson, David S.; Young, Erick R.  
 INVENTOR(S): Boehringer Ingelheim Pharmaceuticals, Inc., USA  
 SOURCE: PCT Int. Appl., 223 pp.  
 CODEN: PIXX02  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002100849	A2	20021219	WO 2002-US17590	20020605
WO 2002100849	A3	20031016		
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW			
RW:	GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LJ, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
US 2003119827	A1	20030626	US 2002-163015	20020604
US 6982263	B2	20060103		
CA 2449192	A1	20021219	CA 2002-2449192	20020605
AU 2002314898	A1	20021223	AU 2002-314898	20020605
EP 1399431	A2	20040324	EP 2002-741825	20020605
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR			
JP 2005501017	T	20050113	JP 2003-503617	20020605
MX 2003PA11113	A	20040319	MX 2003-PA11113	20031203
PRIORITY APPLN. INFO.:			US 2001-296863P	P 20010608
			WO 2002-US17590	W 20020605

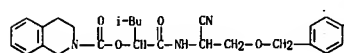
OTHER SOURCE(S): MARPAT 138:24952  
 ABSTRACT:  
 Novel nitrile compds. YC02CR2R3C(X)NR6CR4R5CN [Y = R1, R10, R15, R12N, R13C, where R1 = H, (un)substituted (cyclo)alkyl, aryl, benzyl, tetrahydronaphthyl, indenyl, indanyl, alkylsulfonylalkyl, cycloalkylsulfonylalkyl, arylsulfonylalkyl, heterocyclyl, or heteroaryl; R2-R5 = H, (un)substituted (cyclo)alkyl, aryl, etc. or CR2R3 and CR4R5 may form rings; R6 = H, OH, or (cyclo)alkyl; X = O or S (with provisos)] or their pharmaceutically-acceptable derive, were prepared as reversible inhibitors of cysteine proteases such as cathepsin K, S, F, L and B for treating diseases and pathol. conditions exacerbated by these proteases such as osteoporosis, rheumatoid arthritis, multiple sclerosis, asthma and other autoimmune diseases, Alzheimer's disease, and atherosclerosis. Thus, morpholine-4-carboxylic acid 1-[[[benzyloxymethyl]cyanomethyl]carbamoyl]-3-methylbutyl ester was prepared from N-(tert-butoxycarbonyl)-O-benzyl-L-serine, 2-hydroxyisocaproic acid, and 4-morpholinecarbonyl chloride.

IT 478279-49-1P 478279-54-8P 478280-11-4P  
 478280-12-5P 478280-13-6P 478280-14-7P  
 478280-15-8P 478280-16-9P 478280-17-0P

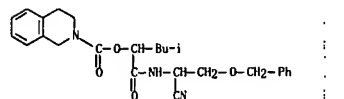
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 (CA INDEX NAME)



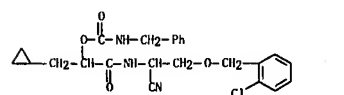
RN 478280-12-5 CAPLUS  
 CN 2-((1H)-isoquinoline-4-carboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-((4-methoxyphenyl)methoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



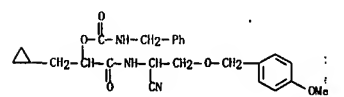
RN 478280-13-6 CAPLUS  
 CN 2-((1H)-isoquinoline-4-carboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-((phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



RN 478280-14-7 CAPLUS  
 CN Carbamic acid, (phenylmethyl)-, 2-[[[2-((2-chlorophenyl)methoxy)-1-cyanoethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)



RN 478280-15-8 CAPLUS  
 CN Carbamic acid, (phenylmethyl)-, 2-[[[1-cyano-2-((4-methoxyphenyl)methoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)



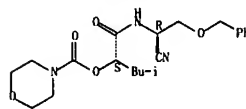
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

478280-18-1P 478280-19-2P 478280-20-3P  
 478280-21-4P 478280-22-5P 478280-23-6P  
 478280-24-7P 478280-25-8P 478280-26-9P  
 478280-27-0P 478280-28-1P 478280-29-2P  
 478280-30-3P 478280-31-4P 478280-32-5P  
 478280-33-6P 478280-34-7P 478280-35-8P  
 478280-36-9P 478280-37-0P 478280-38-1P  
 478280-39-2P 478280-40-3P 478280-41-4P  
 478280-42-5P 478280-43-6P 478280-44-7P  
 478280-45-8P 478280-46-9P 478280-47-0P  
 478280-48-1P 478280-49-2P 478280-50-3P  
 478280-51-4P 478280-52-5P 478280-53-6P  
 478280-54-7P 478280-55-8P 478280-56-9P  
 478280-57-0P 478280-58-1P 478280-59-2P  
 478280-60-3P 478280-61-4P 478280-62-5P  
 478280-63-6P 478280-64-7P 478280-65-8P  
 478280-66-9P 478280-67-0P 478280-68-1P  
 478280-69-2P 478280-70-3P 478280-71-4P  
 478280-72-5P 478280-73-6P 478280-74-7P  
 478280-75-8P 478280-76-9P 478280-77-0P  
 478280-78-1P 478280-79-2P 478280-80-3P  
 478280-81-4P 478280-82-5P 478280-83-6P  
 478280-84-7P 478280-85-8P 478280-86-9P  
 478280-87-0P 478280-88-1P 478280-89-2P  
 478280-90-3P 478280-91-4P 478280-92-5P  
 478280-93-6P 478280-94-7P 478280-95-8P

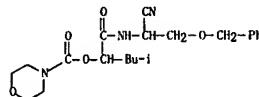
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (prepn. of novel amino nitriles as reversible inhibitors of cysteine proteases)

RN 478279-49-1 CAPLUS  
 CN 4-morpholinecarboxylic acid, (1S)-1-[[[1-cyano-2-((phenylmethoxy)ethyl)amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)

Absolute stereochemistry.



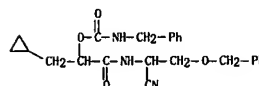
RN 478279-54-8 CAPLUS  
 CN 4-morpholinecarboxylic acid, 1-[[[1-cyano-2-((phenylmethoxy)ethyl)amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



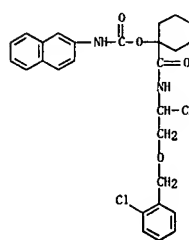
RN 478280-11-4 CAPLUS  
 CN 2-((1H)-isoquinoline-4-carboxylic acid, 3,4-dihydro-, 1-[[[2-((2-chlorophenyl)methoxy)-1-cyanoethyl]amino]carbonyl]-3-methylbutyl ester

L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

RN 478280-16-9 CAPLUS  
 CN Carbamic acid, (phenylmethyl)-, 2-[[[1-cyano-2-((phenylmethoxy)ethyl)amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)

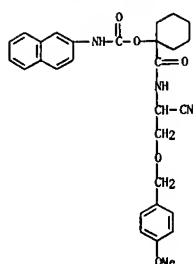


RN 478280-17-0 CAPLUS  
 CN Carbamic acid, 2-naphthalenyl-, 1-[[[2-((2-chlorophenyl)methoxy)-1-cyanoethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

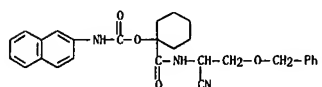


RN 478280-18-1 CAPLUS  
 CN Carbamic acid, 2-naphthalenyl-, 1-[[[1-cyano-2-((4-methoxyphenyl)methoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

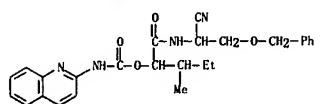
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 478280-19-2 CAPLUS  
 CN Carbanic acid, 2-naphthalenyl-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

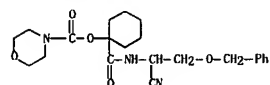


RN 478280-27-2 CAPLUS  
 CN Carbanic acid, 2-quinolinyl-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

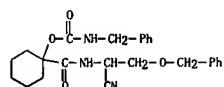


RN 478280-28-3 CAPLUS  
 CN Carbanic acid, (phenylmethyl)-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

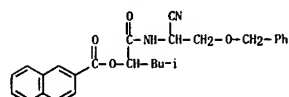
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



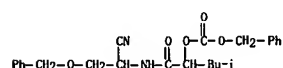
RN 478280-33-0 CAPLUS  
 CN Carbanic acid, (phenylmethyl)-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)



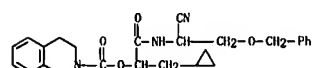
RN 478280-34-1 CAPLUS  
 CN 2-Naphthalenecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)



RN 478280-35-2 CAPLUS  
 CN Carbanic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

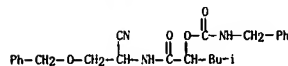


RN 478280-36-3 CAPLUS  
 CN 2-(1H)-isoquinolinecarboxylic acid, 3,4-dihydro-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (CA INDEX NAME)

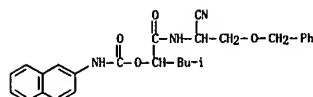


RN 478280-37-4 CAPLUS  
 CN 2-Naphthalenecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (CA INDEX NAME)

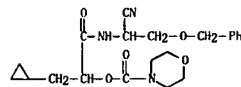
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



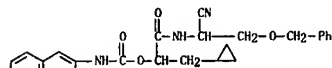
RN 478280-29-4 CAPLUS  
 CN Carbanic acid, 2-naphthalenyl-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (9C1) (CA INDEX NAME)



RN 478280-30-7 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (CA INDEX NAME)

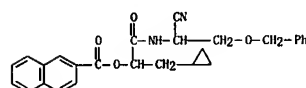


RN 478280-31-8 CAPLUS  
 CN Carbanic acid, 2-naphthalenyl-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)

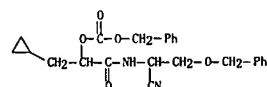


RN 478280-32-9 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (CA INDEX NAME)

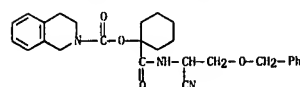
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



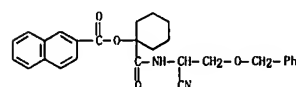
RN 478280-38-5 CAPLUS  
 CN Carbanic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl phenylmethyl ester (CA INDEX NAME)



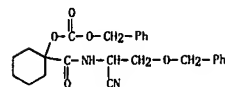
RN 478280-39-6 CAPLUS  
 CN 2-(1H)-isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (CA INDEX NAME)



RN 478280-40-9 CAPLUS  
 CN 2-Naphthalenecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (CA INDEX NAME)

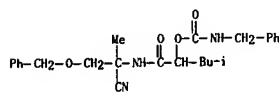


RN 478280-41-0 CAPLUS  
 CN Carbanic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (CA INDEX NAME)

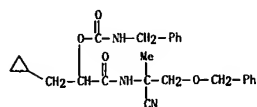


RN 478280-42-1 CAPLUS

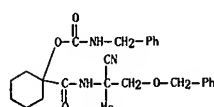
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Carbamic acid, (phenylmethyl)-, 1-[[[1-cyano-1-methyl-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (9C1) (CA INDEX NAME)



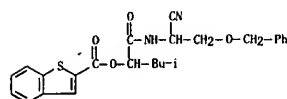
RN 478280-45-4 CAPLUS  
 CN Carbamic acid, (phenylmethyl)-, 2-[[[1-cyano-1-methyl-2-(phenylmethoxy)ethyl]amino]-1-(cyclopropylmethyl)-2-oxoethyl ester (9C1) (CA INDEX NAME)



RN 478280-48-7 CAPLUS  
 CN Carbamic acid, (phenylmethyl)-, 1-[[[1-cyano-1-methyl-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl ester (9C1) (CA INDEX NAME)

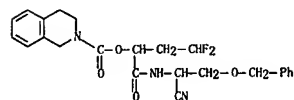


RN 478280-52-3 CAPLUS  
 CN Benzo[b]thiophene-2-carboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)

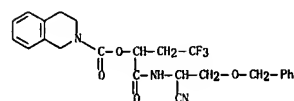


RN 478280-53-4 CAPLUS

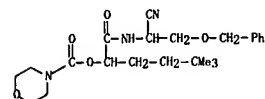
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



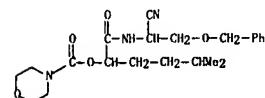
RN 478280-58-9 CAPLUS  
 CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3,3-trifluoropropyl ester (CA INDEX NAME)



RN 478281-00-4 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-4,4-dimethylpentyl ester (CA INDEX NAME)



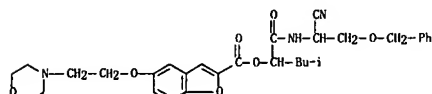
RN 478281-03-7 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-4-methylpentyl ester (CA INDEX NAME)



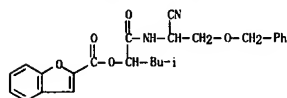
RN 478281-06-0 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3,4,4-tetramethylpentyl ester (CA INDEX NAME)



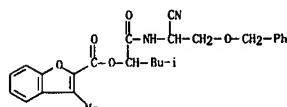
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN 2-Benzofurancarboxylic acid, 5-[2-(4-morpholinyl)ethoxy]-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



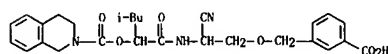
RN 478280-54-5 CAPLUS  
 CN 2-Benzofurancarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



RN 478280-55-6 CAPLUS  
 CN 2-Benzofurancarboxylic acid, 3-methyl-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



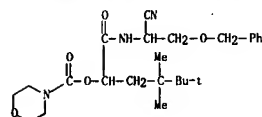
RN 478280-56-7 CAPLUS  
 CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[2-(3-carboxyphenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl ester (CA INDEX NAME)



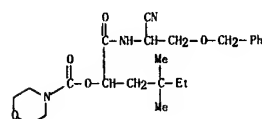
RN 478280-57-8 CAPLUS  
 CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-difluoropropyl ester (CA INDEX NAME)



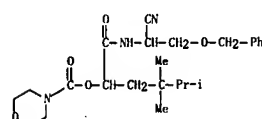
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



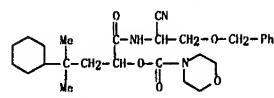
RN 478281-09-3 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-dimethylpentyl ester (CA INDEX NAME)



RN 478281-12-8 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3,4-trimethylpentyl ester (CA INDEX NAME)



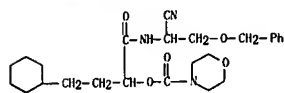
RN 478281-15-1 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-cyclohexyl-3-methylbutyl ester (CA INDEX NAME)



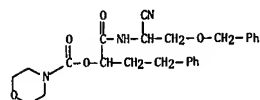
RN 478281-18-4 CAPLUS  
 CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-cyclohexylpropyl ester (CA INDEX NAME)



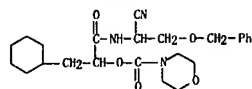
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



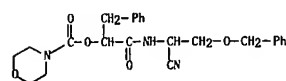
RN 478281-21-9 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-phenylpropyl ester (CA INDEX NAME)



RN 478281-25-3 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl ester (CA INDEX NAME)

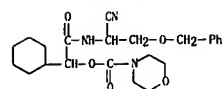


RN 478281-28-6 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2-oxo-1-(phenylmethyl)ethyl ester (CA INDEX NAME)

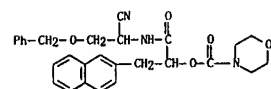


RN 478281-31-1 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-[(1-methylcyclohexyl)methyl]-2-oxoethyl ester (CA INDEX NAME)

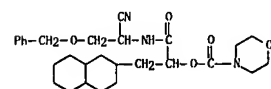
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



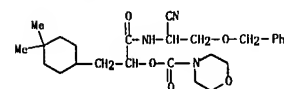
RN 478281-46-8 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2-naphthalenylmethyl)-2-oxoethyl ester (CA INDEX NAME)



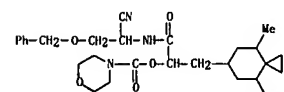
RN 478281-49-1 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-[(decahydro-2-naphthalenyl)methyl]-2-oxoethyl ester (CA INDEX NAME)



RN 478281-52-6 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-[(4,4-dimethylcyclohexyl)methyl]-2-oxoethyl ester (CA INDEX NAME)

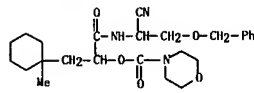


RN 478281-55-9 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-[(4,8-dimethylspiro[2.5]oct-6-yl)methyl]-2-oxoethyl ester (CA INDEX NAME)

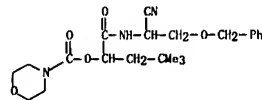


RN 478281-58-2 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-[(4,8-dimethylspiro[2.5]oct-6-yl)methyl]-2-oxoethyl ester (CA INDEX NAME)

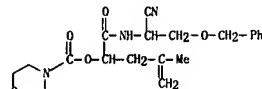
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



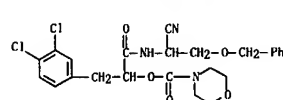
RN 478281-34-4 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-dimethylbutyl ester (CA INDEX NAME)



RN 478281-37-7 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methyl-3-butenyl ester (9CI) (CA INDEX NAME)

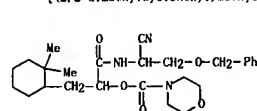


RN 478281-40-2 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(3,4-dichlorophenyl)methyl]-2-oxoethyl ester (CA INDEX NAME)

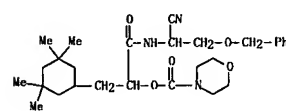


RN 478281-43-5 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(3,4-dichlorophenyl)methyl]-2-oxoethyl ester (CA INDEX NAME)

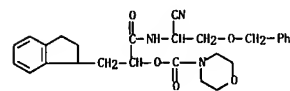
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



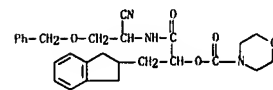
RN 478281-61-7 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2,2-dimethylcyclohexyl)methyl]-2-oxoethyl ester (CA INDEX NAME)



RN 478281-64-0 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(3,3,5,5-tetramethylcyclohexyl)methyl]-2-oxoethyl ester (CA INDEX NAME)

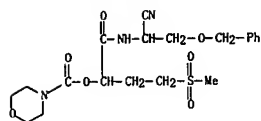


RN 478281-67-3 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2,3-dihydro-1H-inden-1-yl)methyl]-2-oxoethyl ester (CA INDEX NAME)

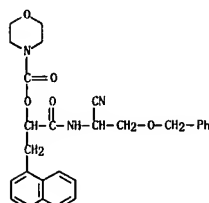


RN 478281-70-8 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-(methylsulfonyl)propyl ester (CA INDEX NAME)

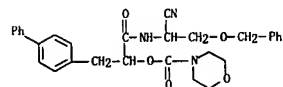
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



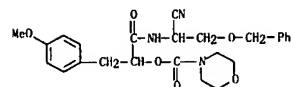
RN 478281-73-1 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(1-naphthalenylmethyl)]-2-oxoethyl ester (CA INDEX NAME)



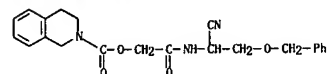
RN 478281-76-4 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1,1'-biphenyl]-4-ylmethyl]-2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2,2-dimethylcyclopropyl)]-2-oxoethyl ester (CA INDEX NAME)



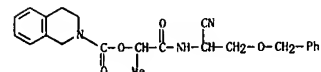
RN 478281-79-7 CAPLUS  
CN 4-Morpholinecarboxylic acid, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(4-methoxyphenyl)methyl]-2-oxoethyl ester (CA INDEX NAME)



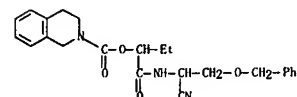
L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



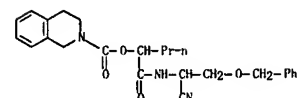
RN 478281-91-3 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-methyl]-2-oxoethyl ester (CA INDEX NAME)



RN 478281-92-4 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]propyl ester (CA INDEX NAME)

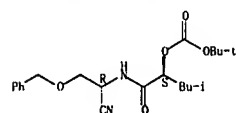


RN 478281-93-5 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]butyl ester (CA INDEX NAME)



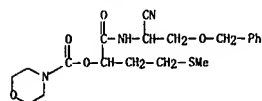
RN 478281-94-6 CAPLUS  
CN Carbonic acid, (1S)-1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]butyl 1,1-dimethylethyl ester (CA INDEX NAME)

Absolute stereochemistry.

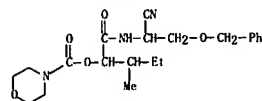


L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

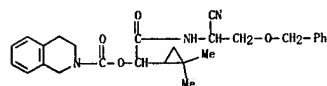
RN 478281-82-2 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-(methylthio)propyl ester (CA INDEX NAME)



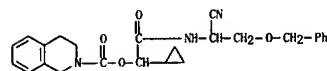
RN 478281-85-5 CAPLUS  
CN 4-Morpholinecarboxylic acid, 1-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-2-methylbutyl ester (CA INDEX NAME)



RN 478281-88-8 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(2,2-dimethylcyclopropyl)-2-oxoethyl ester (CA INDEX NAME)



RN 478281-89-9 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-1-cyclopropyl]-2-oxoethyl ester (CA INDEX NAME)

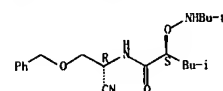


RN 478281-90-2 CAPLUS  
CN 2(1H)-Isoquinolinecarboxylic acid, 3,4-dihydro-, 2-[[[1-cyano-2-(phenylmethoxy)ethyl]amino]-2-oxoethyl ester (CA INDEX NAME)

L4 ANSWER 32 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

RN 478281-95-7 CAPLUS  
CN Pentanamide, N-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-[[[(1,1-dimethylethyl)amino]oxy]-4-methyl-, (2S)- (CA INDEX NAME)

Absolute stereochemistry.

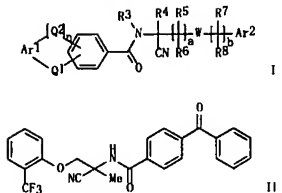


L4 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2002:888695 CAPLUS  
 DOCUMENT NUMBER: 137:384655  
 TITLE: Preparation of benzamidoacetoneitriles for controlling parasites  
 INVENTOR(S): Ducray, Pierre; Bouvier, Jacques; Keller, Matthias; Bergamin, Corina  
 PATENT ASSIGNEE(S): Novartis AG, Switz.; Novartis-Erfindungen Verwaltungsgesellschaft m.b.H.; Novartis Pharma GmbH  
 SOURCE: PCT Int. Appl., 81 pp; CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002092552	A2	20021121	WO 2002-EP5294	20020514
WO 2002092552	A3	20031211		
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LT, LU, LV, MA, MD, ME, MN, MX, NO, NZ, OM, PH, PL, PT, RO, RU, SE, SG, SI, SK, TJ, TM, TN, TR, TT, UA, US, UZ, VN, YU, ZA, ZW			
RW:	AM, AZ, BY, BG, KZ, MD, RU, TJ, TM, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR			
CA 2447084	A1	20021121	CA 2002-2447084	20020514
AU 2002316903	A1	20021125	AU 2002-316903	20020514
EP 1390344	A2	20040225	EP 2002-745292	20020514
EP 1390344	B1	20061227		
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR			
BR 200209828	A	20040615	BR 2002-9828	20020514
CN 1531525	A	20040922	CN 2002-811935	20020514
JP 2004533451	T	20041104	JP 2002-589438	20020514
NZ 529368	A	20050624	NZ 2002-529368	20020514
RU 2284990	C2	20061010	RU 2003-134179	20020514
AT 349421	T	20070115	AT 2002-745292	20020514
ZA 2003008592	A	20040903	ZA 2003-8592	20031104
IN 2003CN01783	A	20060106	IN 2003-CN1783	20031113
MX 2003PA10404	A	20040309	MX 2003-PA10404	20031114
US 2004220055	A1	20041104	US 2004-477289	20040601
PRIORITY APPLN. INFO:			CH 2001-919	20010515
OTHER SOURCE(S):		MARPAT 137:384655	WO 2002-EP5294	W 20020514
GRAPHIC IMAGE:				

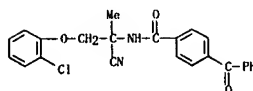
L4 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



## ABSTRACT:

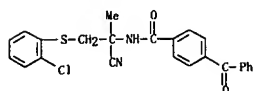
The title compds. [1: Ar1, Ar2 = (un)substituted Ph, OPh, phenylacetylenyl, etc.; Q1 = CH2, OCH2, S, SO, SO2, CO; Q2 = a bond, CO; R3 = H, alkyl, haloalkyl, etc.; R4-R8 = H, halo, alkyl, etc.; or R4 and R5 together = alkylene; W = O, S, SO2, NH, Nalkyl; a = 1-4; b = 0-4; n = 0-1] which have advantageous pesticidal properties, and are especially suitable for controlling parasites in warm-blooded animals (also humans), were prepared and formulated. Thus, amidation of benzophenone-4-carboxylic acid with 2-amino-2-methyl-3-(2-(trifluoromethyl)phenoxy)propionitrile afforded 11 which showed a 100% reduction in *Trichostrongylus* infestation at 32 mg/kg.

IT 476013-54-4P 476013-55-5P 476013-56-6P  
 476013-57-7P 476013-58-8P 476013-59-9P  
 476013-60-2P 476013-61-3P 476013-62-4P  
 476013-63-5P 476013-64-6P 476013-65-7P  
 476013-66-8P 476013-67-9P  
 RL: AGR (Agricultural use); RSU (Biological study, unclassified); PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of benzamidoacetoneitriles for controlling parasites)  
 RN 476013-54-4 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[2-(2-chlorophenyl)-1-cyano-1-methylethyl]- (CA INDEX NAME)

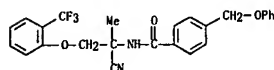


RN 476013-55-5 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[2-[(2-chlorophenyl)thio]-1-cyano-1-methylethyl]- (CA INDEX NAME)

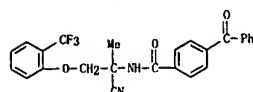
L4 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



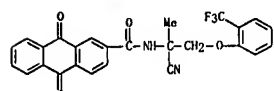
RN 476013-56-6 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-4-(phenoxymethyl)- (CA INDEX NAME)



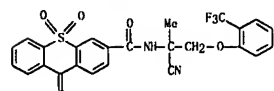
RN 476013-57-7 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 476013-58-8 CAPLUS  
 CN 2-Anthracenecarboxamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-9,10-dihydro-9,10-dioxo- (CA INDEX NAME)

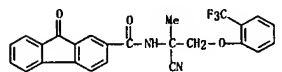


RN 476013-59-9 CAPLUS  
 CN 9H-Thioxanthene-3-carboxamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-9-oxo-, 10,10-dioxo- (CA INDEX NAME)

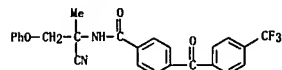


L4 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

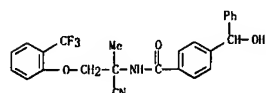
RN 476013-60-2 CAPLUS  
 CN 9H-Fluorene-2-carboxamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-9-oxo- (CA INDEX NAME)



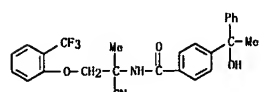
RN 476013-61-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-phenoxyethyl]-4-[4-(trifluoromethyl)benzoyl]- (CA INDEX NAME)



RN 476013-62-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-4-(hydroxyphenylmethyl)- (CA INDEX NAME)



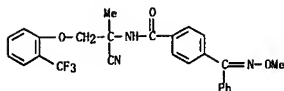
RN 476013-63-5 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-4-(1-hydroxy-1-phenylethyl)- (CA INDEX NAME)



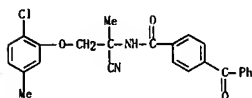
RN 476013-64-6 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[2-(trifluoromethyl)phenoxy]ethyl]-4-[(methoxyimino)phenylmethyl]- (CA INDEX NAME)



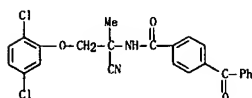
L4 ANSWER 33 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



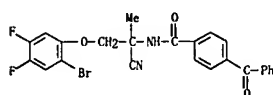
RN 476013-65-7 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[2-(2-chloro-5-methylphenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 476013-66-8 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[1-cyano-2-(2,5-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



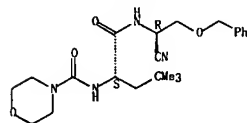
RN 476013-67-9 CAPLUS  
 CN Benzamide, 4-benzoyl-N-[1-cyano-2-(2-bromo-4,5-difluorophenoxy)-1-methylethyl]- (CA INDEX NAME)



L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 BIOL (Biological study); PREP (Preparation)  
 (prepn. and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors)

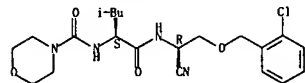
RN 290816-78-3 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-(2-cyanoethyl)amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



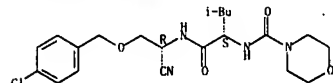
RN 290816-82-9 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-(2-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



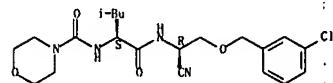
RN 290816-83-0 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-(4-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-89-6 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-(3-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-91-0 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-(2-

L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2002:835002 CAPLUS

DOCUMENT NUMBER: 138:56234

TITLE: Design and synthesis of dipeptide nitriles as

reversible and potent cathepsin S inhibitors

AUTHOR(S): Ward, Vancey D.; Thomson, David S.; Frye, Leah L.;  
 Cywin, Charles L.; Norwick, Tina; Emanuel, Michel J.;  
 Zindell, Renee; McNeil, Daniel; Bekkali, Younes;  
 Giradot, Marc; Hrapchak, Matt; DeTuri, Molly; Crane,  
 Kathy; White, Della; Pav, Susan; Wang, Yong; Mao,  
 Ming-Hong; Grygon, Christine A.; Labadia, Mark E.;  
 Freeman, Dorothy M.; Davidson, Walter; Hopkins, Jerry  
 L.; Brown, Waryanne L.; Spero, Denise M.

CORPORATE SOURCE: Boehringer Ingelheim Pharmaceuticals, Ridgefield, CT,  
 06877-0368, USA

SOURCE: Journal of Medicinal Chemistry (2002), 45(25),  
 5471-5482

PUBLISHER: CODEN: JMCMAR; ISSN: 0022-2623

DOCUMENT TYPE: American Chemical Society

LANGUAGE: English

OTHER SOURCE(S): CASREACT 138:56234

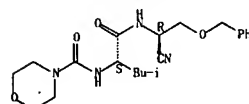
ABSTRACT: The specificity of the immune response relies on processing of foreign proteins and presentation of antigenic peptides at the cell surface. Inhibition of antigen presentation, and the subsequent activation of T-cells, should, in theory, modulate the immune response. The cysteine protease cathepsin S performs a fundamental step in antigen presentation and therefore represents an attractive target for inhibition. Herein, the authors report a series of potent and reversible Cathepsin S inhibitors based on dipeptide nitriles. These inhibitors show nanomolar inhibition of the target enzyme as well as cellular potency in a human B cell line. The first x-ray crystal structure of a reversible inhibitor cocryst. with cathepsin S is also reported.

IT 290816-77-2P

RL: BSU (Biological study, unclassified); PRP (Properties); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)  
 (preparation and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors)

RN 290816-77-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

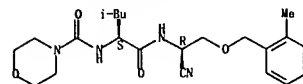
Absolute stereochemistry.



IT 290816-78-3P 290816-82-9P 290816-83-0P  
 290816-89-6P 290816-91-0P 290817-02-6P  
 479091-65-1P 479091-66-2P 479091-67-3P  
 479091-70-6P 479091-71-9P 479091-72-0P  
 479091-73-1P  
 RL: BSU (Biological study, unclassified); SPN (Synthetic preparation);

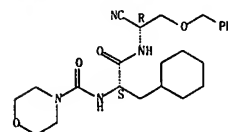
L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 methylphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



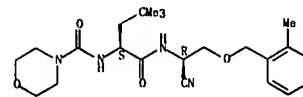
RN 290817-02-6 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 479091-65-1 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(2-methylphenyl)methoxy]ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

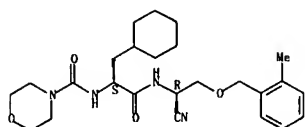
Absolute stereochemistry.



RN 479091-66-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(2-methylphenyl)methoxy]ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

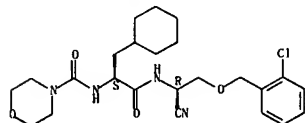
Absolute stereochemistry.

L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



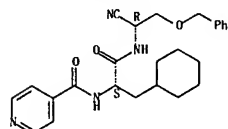
RN 479091-67-3 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-2-[[[(1R)-2-[2-(2-chlorophenyl)methoxy]-1-cyanoethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



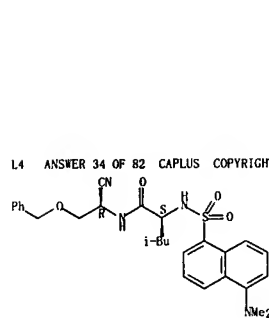
RN 479091-70-8 CAPLUS  
CN 4-Pyridinecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



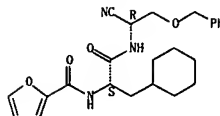
RN 479091-71-9 CAPLUS  
CN 2-Furancarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



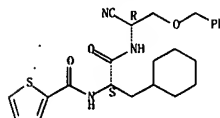
L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 34 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



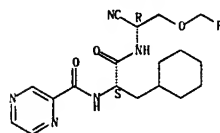
RN 479091-72-0 CAPLUS  
CN 2-Thiophenecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 479091-73-1 CAPLUS  
CN Pyrazinecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



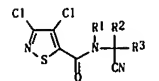
IT 290816-90-9P  
RL: SPN (Synthetic preparation): PREP (Preparation)  
(preparation and biol. activity of dipeptide nitriles as reversible and potent cathepsin S inhibitors)  
RN 290816-90-9 CAPLUS  
CN Pentanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-[[[5-(dimethylamino)-1-naphthalenyl]sulfonyl]amino]-4-methyl-, (2S)- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 35 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2002:504769 CAPLUS  
DOCUMENT NUMBER: 137:78946  
TITLE: Preparation of isothiazolecarboxamides as agrochem. microbicides  
INVENTOR(S): Kitagawa, Yoshinori; Sawada, Haruko; Aszmann, Lutz  
PATENT ASSIGNEE(S): Nihon Bayer Agrochem K.K., Japan  
SOURCE: PCT Int. Appl., 29 pp.  
CODEN: PIXXD2  
DOCUMENT TYPE: Patent  
LANGUAGE: English  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

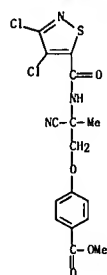
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002051822	A2	20020704	WO 2001-EP14447	20011210
WO 2002051822	A3	20021010		
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GR, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MY, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
JP 2002193956	A	20020710	JP 2000-390318	20001222
AU 2002216086	A1	20020708	AU 2002-216086	20011210
PRIORITY APPLN. INFO.: JP 2000-390318 A 20001222				
OTHER SOURCE(S): MARPAT 137:78946				
GRAPHIC IMAGE:				



ABSTRACT:  
The title compds. [1: R1 = H, cyanomethyl; R2 = H, Me; R3 = H, alkyl, methoxycarbonylphenoxymethyl; provided that R1, R2 and R3 are not simultaneously a hydrogen atom] which are useful in agriculture and horticulture, particularly as fungicides, were prepared. Thus, reacting 3,4-dichloroisothiazole-5-carbonyl chloride with 1-cyano-octanamine in the presence of Et3N in CH2Cl2 afforded 1 [R1, R2 = H; R3 = n-C7H15] which showed control values of more than 90% against *Pyricularia oryzae* at 500 ppm.

IT 439898-30-3P  
RL: AGR (Agricultural use): BSU (Biological study, unclassified): SPN (Synthetic preparation): BIOL (Biological study): PREP (Preparation): USES (Uses)  
(preparation of isothiazolecarboxamides as agrochem. microbicides)  
RN 439898-30-3 CAPLUS  
CN Benzoic acid, 4-[2-cyano-2-[[[(3,4-dichloro-5-isothiazolyl)carbonyl]amino]propoxy]-, methyl ester (CA INDEX NAME)

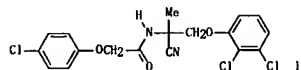
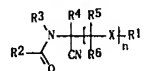
L4 ANSWER 35 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

2002:487545 CAPLUS  
 DOCUMENT NUMBER: 137:63070  
 TITLE: Preparation of N-acyl aminocetonitriles having pesticidal properties  
 INVENTOR(S): Ducray, Pierre; Steiger, Arthur; Bouvier, Jacques;  
 Zambach, Werner  
 PATENT ASSIGNEE(S): Syngenta Participations Ag, Switz.  
 SOURCE: PCT Int. Appl., 55 pp.  
 CODEN: P1XXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002050052	A1	20020627	WO 2001-EPI4922	20011218
W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
AU 2002024942	A5	20020701	AU 2002-24942	20011218
PRIORITY APPL. INFO.: CH 2000-2490 A 20001220				
OTHER SOURCE(S): MARPAT 137:63070				
GRAPHIC IMAGE:				



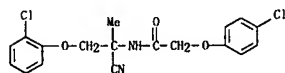
## ABSTRACT:

The title compds. [1: R1 = (un)substituted aryl, heteroaryl; R2 = alkyl, haloalkyl; R3 = H, alkyl, haloalkyl; R4-R6 = H, halo, alkyl, haloalkyl; R7 = halo, alkyl, haloalkoxy; X = O, S, SO, SO2; n = 0-1] which have advantageous pesticidal properties and are suitable for the control of parasites in warm-blooded organisms and of plant pests, were prepared. Thus, amidation of 2-amino-3-(2,3-dichlorophenoxy)-2-methylpropionitrile with 4-chlorophenoxyacetic acid afforded the aminocetonitrile 11. Compds. 1 exhibit good activity against *Heliothis virescens*, *Plutella xylostella* and *Diabrotica balteata*.

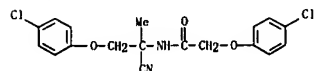
L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

IT 439124-09-1P 439124-11-5P 439124-13-7P  
 439124-15-9P 439124-17-1P 439124-19-3P  
 439124-20-6P 439124-22-8P 439124-24-0P  
 439124-26-2P 439124-27-3P 439124-28-4P  
 439124-29-5P 439124-30-6P 439124-32-0P  
 439124-34-2P 439124-36-4P 439124-38-6P  
 439124-40-0P 439124-42-2P 439124-44-4P  
 439124-46-6P 439124-48-8P 439124-50-2P  
 RL: AGR (Agricultural use); BSU (Biological study, unclassified); SPN (Synthetic preparation); B10L (Biological study); PREP (Preparation); USES (Uses)

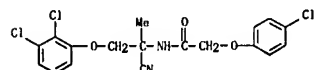
(preparation of N-acyl aminocetonitriles having pesticidal properties)  
 RN 439124-09-1 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



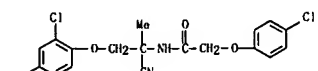
RN 439124-11-5 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 439124-13-7 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,3-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)

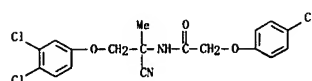


RN 439124-15-9 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)

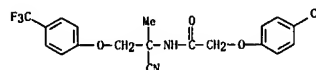


RN 439124-17-1 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)

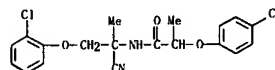
L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



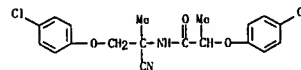
RN 439124-19-3 CAPLUS  
 CN Acetamide, 2-(4-chlorophenoxy)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



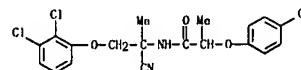
RN 439124-20-6 CAPLUS  
 CN Propenamide, 2-(4-chlorophenoxy)-N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 439124-22-8 CAPLUS  
 CN Propenamide, 2-(4-chlorophenoxy)-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

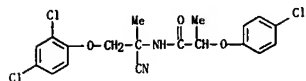


RN 439124-24-0 CAPLUS  
 CN Propenamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,3-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)

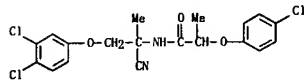


RN 439124-26-2 CAPLUS  
 CN Propenamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)

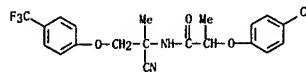
L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



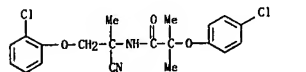
RN 439124-27-3 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



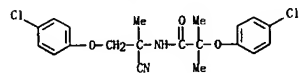
RN 439124-28-4 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 439124-29-5 CAPLUS  
 CN Propanamide, 2-(2-(4-chlorophenoxy)-1-cyano-1-methylethyl)-2-methyl- (CA INDEX NAME)

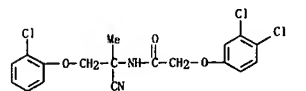


RN 439124-30-8 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-methyl- (CA INDEX NAME)

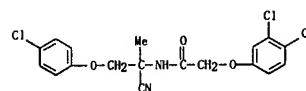


RN 439124-32-0 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,3-dichlorophenoxy)-1-methylethyl]-2-methyl- (CA INDEX NAME)

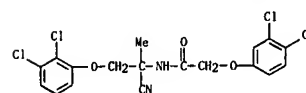
L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



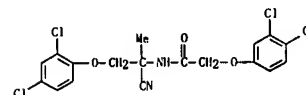
RN 439124-42-2 CAPLUS  
 CN Acetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)



RN 439124-44-4 CAPLUS  
 CN Acetamide, N-[1-cyano-2-(2,3-dichlorophenoxy)-1-methylethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)

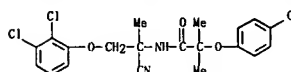


RN 439124-46-6 CAPLUS  
 CN Acetamide, N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)

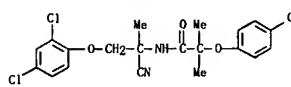


RN 439124-48-8 CAPLUS  
 CN Acetamide, N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)

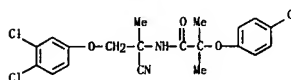
L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



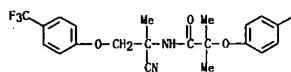
RN 439124-34-2 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]-2-methyl- (CA INDEX NAME)



RN 439124-36-4 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]-2-methyl- (CA INDEX NAME)

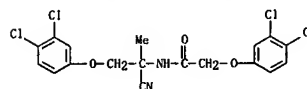


RN 439124-38-6 CAPLUS  
 CN Propanamide, 2-(4-chlorophenoxy)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-methyl- (CA INDEX NAME)

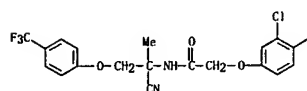


RN 439124-40-0 CAPLUS  
 CN Acetamide, N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)

L4 ANSWER 36 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 439124-50-2 CAPLUS  
 CN Acetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(3,4-dichlorophenoxy)- (CA INDEX NAME)



REFERENCE COUNT: 8 THERE ARE 8 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

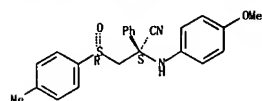
L4 ANSWER 37 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2002:284520 CAPLUS  
 DOCUMENT NUMBER: 137:278955  
 TITLE: Stereoselective cyanosilylation of  $\alpha$ -sulfinyl ketimines or its covalently stabilized enamine tautomers. Synthesis of enantiomerically pure  $\alpha$ -sulfinylmethyl- $\alpha$ -amino nitriles  
 AUTHOR(S): Acherki, Hassan; Alvarez-Ibarra, Carlos; De Dios, Alfonso; Quiroga, Maria L.  
 CORPORATE SOURCE: Departamento de Química Orgánica, Facultad de Ciencias Químicas, Ciudad Universitaria, Universidad Complutense, Madrid, 28040, Spain  
 SOURCE: Tetrahedron (2002), 58(16), 3217-3227  
 CODEN: TETRAH; ISSN: 0040-4020  
 PUBLISHER: Elsevier Science Ltd.  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 137:278955  
 ABSTRACT:

$\alpha$ -Sulfinyl ketimines and  $\beta$ -sulfinyl enamines undergo reaction with delivery cyanide reagents such as (trimethylsilyl)cyanide or (tert-butyl)dimethylsilylcyanide in the presence of either stoichiometric excesses of ZnCl<sub>2</sub> or ZnBr<sub>2</sub>, or catalytic amount of Yb(TfO)<sub>3</sub>. Ketimines included (-)-4-methoxy-N-[2-[(R)-(4-methylphenyl)sulfinyl]-1-phenylethylidene]benzenamine, (+)-3-[[[(R)-(4-methylphenyl)sulfinyl]methyl]-1-oxa-4-azaspiro[4.5]dec-3-ene and (-)-N-[(1E)-2-[(R)-(4-methylphenyl)sulfinyl]ethyl]-N-(phenylmethyl)benzenomethanamine. The use of ZnCl<sub>2</sub> in a/c, solvents provides the best diastereoselectivity. It is mediated by a chelated transition state, the *p*-tolyl group driving the anti attack of the reagent. By using Yb(TfO)<sub>3</sub> poor diastereoselectivities but good yields are obtained. It seems that an iminium derivative originated by metal coordination with either the nitrogen or oxygen atom in the substrate is responsible for the observed results. Interestingly,  $\beta$ -sulfinyl enamines provide analogous  $\alpha$ -amino nitriles in the same reaction conditions. It allowed the cyanosilylation of the covalently stabilized enamines arising from unstable  $\beta$ -sulfinyl aldehydes.

IT 466671-16-9P 466671-17-0P 466671-19-2P  
 466671-20-5P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation of enantiomerically pure  $\alpha$ -amino- $\alpha$ -(sulfinylmethyl) nitriles by stereoselective cyanosilylation of  $\alpha$ -sulfinyl ketimines or their enamine tautomers)  
 RN 466671-16-9 CAPLUS  
 CN Benzeneacetonitrile,  $\alpha$ -[[(4-methoxyphenyl)amino]- $\alpha$ -[[[(R)-(4-methylphenyl)sulfinyl]methyl]-, (oS)- (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



RN 466671-17-0 CAPLUS  
 CN Benzeneacetonitrile,  $\alpha$ -[[(4-methoxyphenyl)amino]- $\alpha$ -[[[(R)-(4-methylphenyl)sulfinyl]methyl]-, (oS)- (CA INDEX NAME)

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2001:851106 CAPLUS  
 DOCUMENT NUMBER: 135:371998  
 TITLE: Preparation of N-substituted peptidyl nitriles as cysteine cathepsin inhibitors  
 INVENTOR(S): Cowen, Scott Douglas; Greenspan, Paul David; McQuire, Leslie Wighton; Tommasi, Ruben Alberto; Van Duzer, John Henry  
 PATENT ASSIGNEE(S): Novartis A.-G., Switz.; Novartis-Erfindungen  
 SOURCE: Verwertungsgesellschaft m.b.H.  
 PCT Int. Appl., 69 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2001087828	A1	20011122	WO 2001-EP5463	20010514
W: AP, AG, AL, AM, AT, AU, A2, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TW, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW				
RW: GM, GR, HE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, CA, GN, GW, ML, MR, NE, SN, TD, TG				
CA 2407463	A1	20011122	CA 2001-2407463	20010514
EP 1283825	A1	20030219	EP 2001-977958	20010514
EP 1283825	B1	20050914		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				
JP 200353506	T	20031111	JP 2001-584225	20010514
AT 304526	T	20050915	AT 2001-977958	20010514
ES 2249482	T3	20060401	ES 2001-1977958	20010514
US 2003158255	A1	20030821	US 2002-275583	20021107
US 6812337	B2	20041102		
PRIORITY APPL. INFO.:			US 2000-204217P	P 20000515
			WO 2001-EP5463	W 20010514

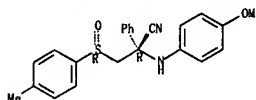
OTHER SOURCE(S): MARPAT 135:371998

ABSTRACT: Peptidyl nitriles R<sup>1</sup>NHCR<sub>2</sub>2R<sup>3</sup>CONHCR<sub>4</sub>SR<sup>5</sup> (R<sup>1</sup> is (bi)aryl; R<sup>2</sup> is (bi)aryl-lower alkyl, benzo-fused cycloalkyl, (bi)cycloalkyl-lower alkyl, arylalkyl-lower alkyl, or aryl-C2-C7-alkyl in which C2-C7-alkyl is interrupted by Y (Y is O, S, SO, SO<sub>2</sub>, CO, NH or alkylimino); R<sup>3</sup> is H or lower alkyl or R<sup>2</sup> and R<sup>3</sup> combined are C2-C7-alkylene or -alkylene interrupted by Y; R<sup>4</sup> is H or lower alkyl; R<sup>5</sup> is H, optionally substituted lower alkyl, (bi)aryl-lower alkyl, (bi)cycloalkyl-lower alkyl, arylalkyl-lower alkyl, or aryl-C2-C7-alkyl in which C2-C7-alkyl is interrupted by Y) or their pharmaceutically acceptable salts were prepared as cysteine cathepsin inhibitors. Thus, N-[2-(3-carboxy-4-fluorobenzoyloxy)-1-(S)-cynoethyl]-3-methyl-Na-phenyl-L-phenylalaninamide was prepared by condensation of (S)-2-amino-3-[3-[(2-(trimethylsilyl)ethoxy)carbonyl]-4-fluorobenzoyloxy]propionitrile with N-phenyl-L-3-methyl-L-phenylalanine (syntheses given), followed by ester cleavage.

IT 374118-06-6P 374118-08-8P 374118-09-9P  
 374118-10-2P 374118-11-3P 374118-12-4P  
 374118-13-5P 374118-14-6P 374118-15-7P  
 374118-16-8P 374118-18-0P 374118-19-1P  
 374118-21-5P 374118-22-6P 374118-23-7P  
 374118-24-8P 374118-25-9P 374118-26-0P  
 374118-27-1P 374118-28-2P 374118-29-3P  
 374118-30-6P 374118-31-7P 374118-32-8P

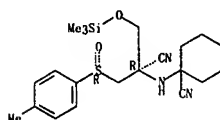
L4 ANSWER 37 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

Absolute stereochemistry. Rotation (-).



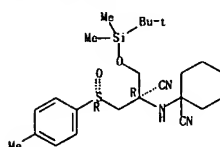
RN 466671-19-2 CAPLUS  
 CN Cyclohexanecarbonitrile, 1-[[[(1R)-1-cyano-1-[[[(R)-(4-methylphenyl)sulfinyl]methyl]-2-[(trimethylsilyl)oxy]ethyl]amino]- (CA INDEX NAME)

Absolute stereochemistry.



RN 466671-20-5 CAPLUS  
 CN Cyclohexanecarbonitrile, 1-[[[(1R)-1-cyano-1-[[[(1,1-dimethylethyl)dimethylsilyl]oxy]methyl]-2-[(R)-(4-methylphenyl)sulfinyl]ethyl]amino]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



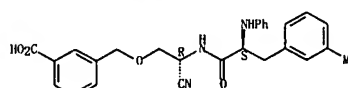
REFERENCE COUNT: 63 THERE ARE 63 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

374118-33-9P 374118-34-0P 374118-35-1P  
 374118-36-2P 374118-37-3P 374118-38-4P  
 374118-39-5P 374118-40-6P 374118-41-9P  
 374118-42-0P 374118-43-1P 374118-44-2P  
 374118-45-3P 374118-46-4P 374118-47-5P  
 374118-48-6P 374118-49-7P 374118-50-0P  
 374118-51-1P 374118-52-2P 374118-53-3P  
 374118-54-4P 374118-55-5P 374118-56-6P  
 374118-57-7P 374118-58-8P 374118-59-9P  
 374118-60-2P 374118-61-3P 374118-62-4P  
 374118-63-5P 374118-66-8P 374118-67-9P  
 374118-68-0P 374118-69-1P 374118-70-4P  
 374118-71-5P 374118-72-6P 374118-73-7P  
 374118-74-8P 374118-75-9P 374118-76-0P  
 374118-77-1P 374118-78-2P 374118-79-3P  
 374118-80-6P 374118-81-7P 374118-82-8P  
 374118-83-9P 374118-84-0P 374118-85-1P  
 374119-63-8P  
 RL: BAC (Biological activity or effector, except adverse); RSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (prepn. of N-substituted peptidyl nitriles as cysteine cathepsin inhibitors)

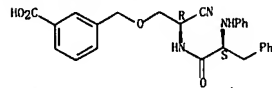
RN 374118-06-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-08-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-3-phenyl-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

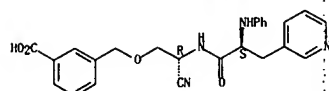
Absolute stereochemistry.



RN 374118-09-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-2-(phenylamino)-3-(3-pyridinyl)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

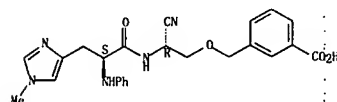
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



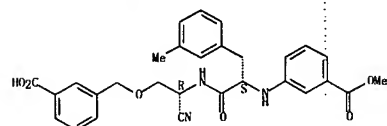
RN 374118-10-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(1-methyl-1H-imidazo-4-yl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-11-3 CAPLUS  
CN Benzoic acid, 3-[[[(1S)-2-[[[(1R)-2-[(3-carboxyphenyl)methoxy]-1-cyanoethyl]amino]-1-[(3-methylphenyl)methyl]-2-oxoethyl]amino]-, 1-methyl ester (CA INDEX NAME)

Absolute stereochemistry.

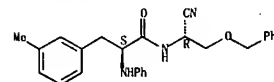


RN 374118-12-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[(4-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
α-(phenylamino)-, (αS)- (CA INDEX NAME)

Absolute stereochemistry.

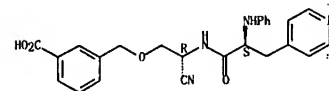


RN 374118-18-0 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-2-(phenylamino)-3-(4-pyridinyl)propyl]amino]ethoxy]methyl]-, trifluoroacetate (9C1) (CA INDEX NAME)

CM 1

CRN 374118-17-9  
CMF C2S H24 N4 O4

Absolute stereochemistry.



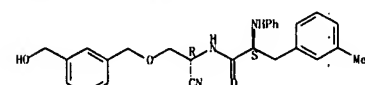
CM 2

CRN 76-05-1  
CMF C2 H F3 O2



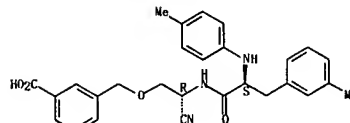
RN 374118-19-1 CAPLUS  
CN Benzenepropanamide, N-[[[(1R)-1-cyano-2-[[[(3-(hydroxymethyl)phenyl)methoxy]ethyl]-3-methyl-α-(phenylamino)-, (αS)- (CA INDEX NAME)

Absolute stereochemistry.



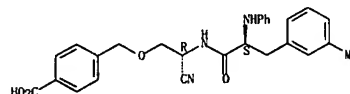
RN 374118-21-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-2-(phenylamino)-3-(1H-

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



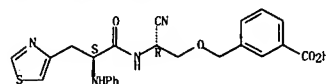
RN 374118-13-5 CAPLUS  
CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



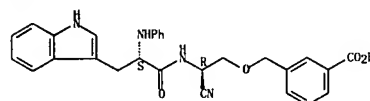
RN 374118-14-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-2-(phenylamino)-3-(4-thiazolyl)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-15-7 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(1H-indol-3-yl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



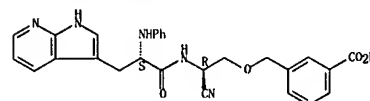
RN 374118-16-8 CAPLUS  
CN Benzenepropanamide, N-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-3-methyl-

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
pyrrolo[2,3-b]pyridin-3-yl]propyl]amino]ethoxy]methyl]-, trifluoroacetate (9C1) (CA INDEX NAME)

CM 1

CRN 374118-20-4  
CMF C27 H25 N5 O4

Absolute stereochemistry.



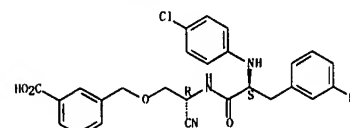
CM 2

CRN 76-05-1  
CMF C2 H F3 O2



RN 374118-22-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[[(4-chlorophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

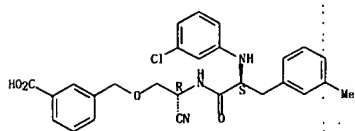
Absolute stereochemistry.



RN 374118-23-7 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[[(3-chlorophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

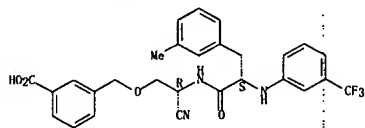
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



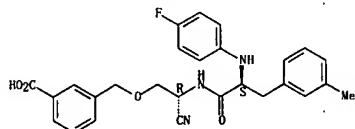
RN 374118-24-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[3-(trifluoromethyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-25-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[4-fluorophenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

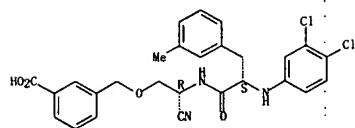
Absolute stereochemistry.



RN 374118-26-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[(2-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

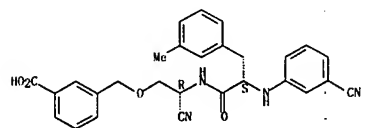
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



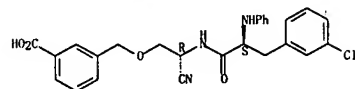
RN 374118-30-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-cyanophenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



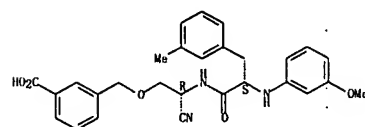
RN 374118-31-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-chlorophenyl)-1-oxo-2-(phenylamino)propyl]amino]-2-cyanoethoxy]methyl]- (3-chlorophenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

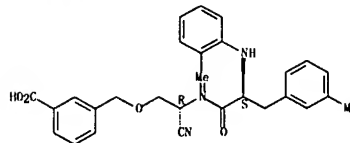


RN 374118-32-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-methoxyphenyl]amino]-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

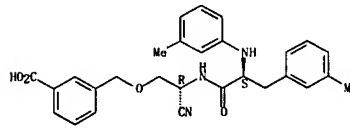


L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



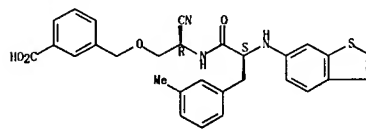
RN 374118-27-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[(3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-28-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[6-benzothiazolylamino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

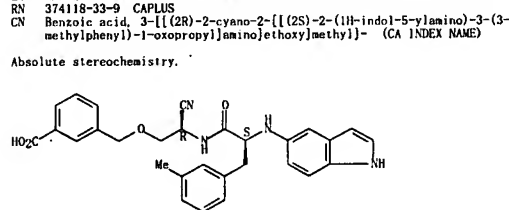
Absolute stereochemistry.



RN 374118-29-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3,4-dichlorophenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

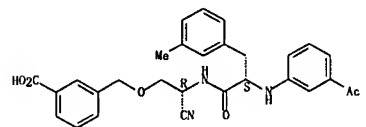
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



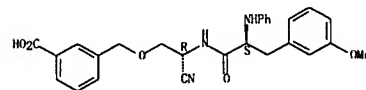
RN 374118-33-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[1H-indol-5-ylamino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



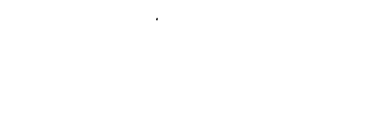
RN 374118-34-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-acetylphenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (3-methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



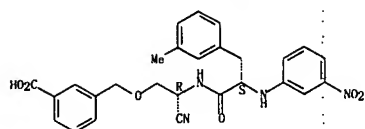
RN 374118-35-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methoxyphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (3-methoxyphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



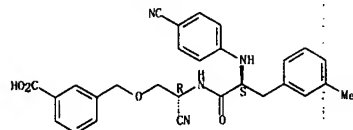
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



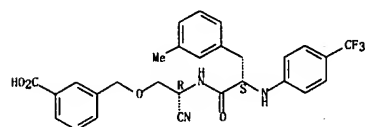
RN 374118-37-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(4-cyanophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-38-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3-methylphenyl)-1-oxo-2-[[4-(trifluoromethyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

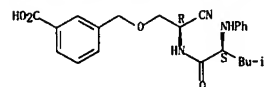
Absolute stereochemistry.



RN 374118-39-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3-methylphenyl)-2-[[4-(methylsulfonyl)phenyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

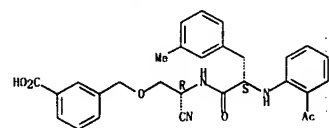
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



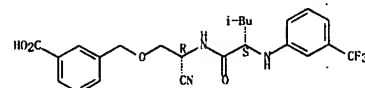
RN 374118-43-1 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2-acetylphenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



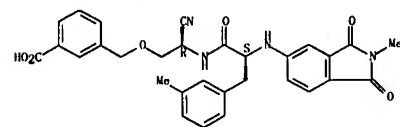
RN 374118-44-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2-acetylphenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



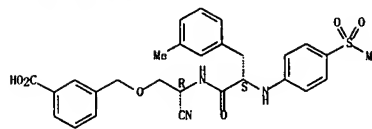
RN 374118-45-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2,3-dihydro-2-methyl-1,3-dioxo-1H-indol-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



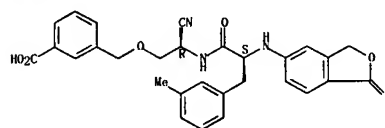
RN 374118-46-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2,3-dihydro-2-methyl-1,3-dioxo-1H-indol-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



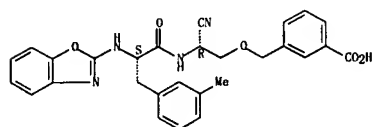
RN 374118-40-8 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-41-9 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

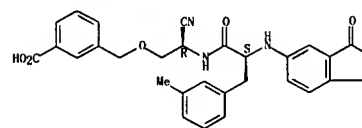


RN 374118-42-0 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

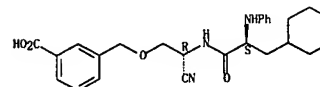
L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
y)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



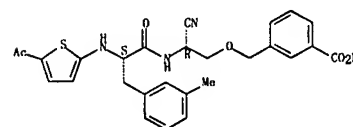
RN 374118-47-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



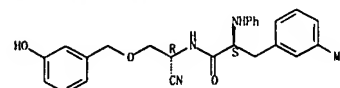
RN 374118-48-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-49-7 CAPLUS  
CN Benzeneopropionamide, N-[[[(1R)-1-cyano-2-[(3-hydroxyphenyl)methoxy]ethyl]-3-methyl-α-(phenylamino)-, (4S)- (CA INDEX NAME)

Absolute stereochemistry.

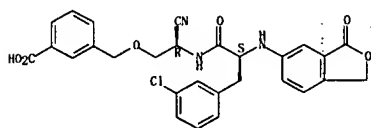




L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

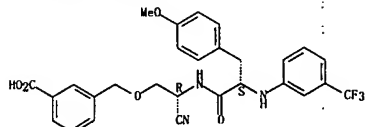
RN 374118-50-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-3-(3-chlorophenyl)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



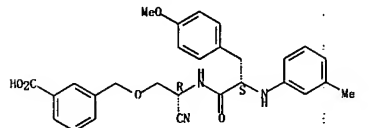
RN 374118-51-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[3-(trifluoromethyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



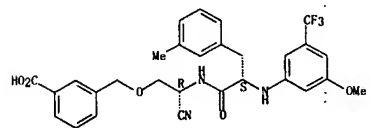
RN 374118-52-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-2-[[3-(methylphenyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



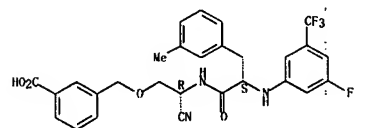
RN 374118-53-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2-fluoro-5-methylphenyl)amino]-3-(4-methoxyphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



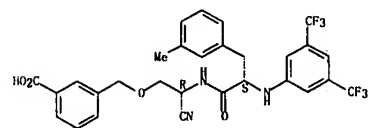
RN 374118-57-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-fluoro-5-(trifluoromethyl)phenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-58-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[3,5-bis(trifluoromethyl)phenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

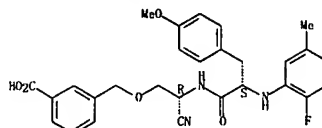


RN 374118-59-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(5-methyl-2-furanyl)-1-oxo-2-[[3-(trifluoromethyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

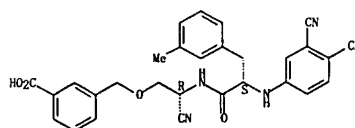
L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



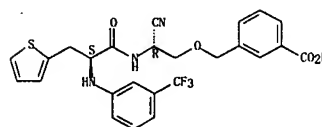
RN 374118-54-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-(4-dicyanophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



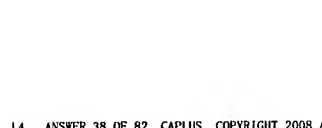
RN 374118-55-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-3-(2-thienyl)-2-[[3-(trifluoromethyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

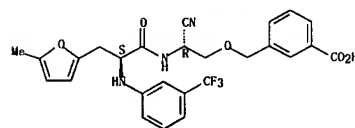


RN 374118-56-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-methoxy-5-(trifluoromethyl)phenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

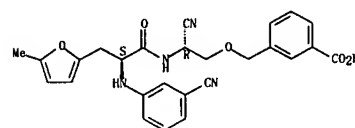


L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



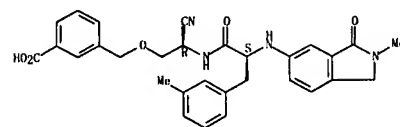
RN 374118-60-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-cyanophenyl]amino]-3-(5-methyl-2-furanyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-61-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2,3-dihydro-2-methyl-3-oxo-1H-isindol-5-yl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

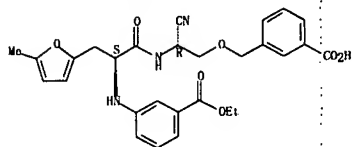
Absolute stereochemistry.



RN 374118-62-4 CAPLUS  
 CN Benzoic acid, 3-[[[(1S)-2-[[[(1R)-2-[[3-carboxyphenyl]methoxy]-1-cyanoethyl]amino]-1-[(5-methyl-2-furanyl)methyl]-2-oxonethyl]amino]-1-methyl ester (CA INDEX NAME)

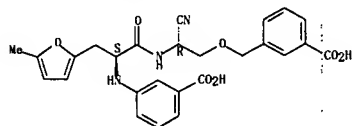
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



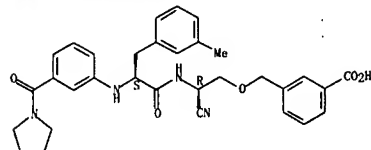
RN 374118-63-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(3-carboxyphenyl)amino]-3-(5-methyl-2-furanyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



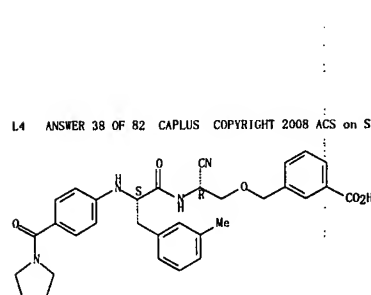
RN 374118-66-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[3-(1-pyrrolidinylcarbonyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



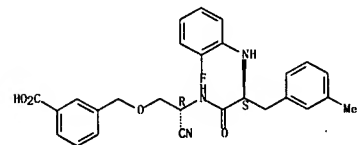
RN 374118-67-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-(dimethylamino)carbonyl]phenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



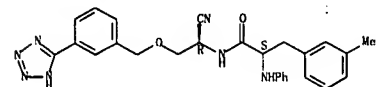
RN 374118-71-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2-fluorophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-72-6 CAPLUS  
 CN Benzenepropanamide, N-[[[(1R)-1-cyano-2-[[3-(1H-tetrazol-5-yl)phenyl]methoxy]ethyl]-3-methyl-α-(phenylamino)-, (αS)- (9C1) (CA INDEX NAME)

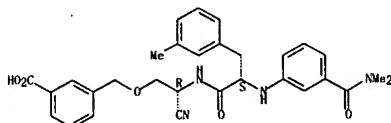
Absolute stereochemistry.



RN 374118-73-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

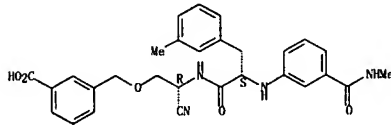
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



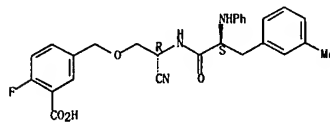
RN 374118-68-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-[(methylamino)carbonyl]phenyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-69-1 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.

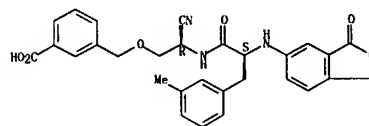


RN 374118-70-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[4-(1-pyrrolidinylcarbonyl)phenyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

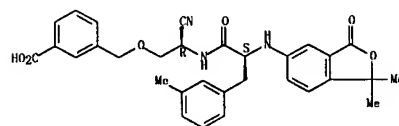


L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



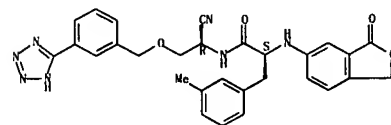
RN 374118-74-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-1,1-dimethyl-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-75-9 CAPLUS  
 CN Benzenepropanamide, N-[[[(1R)-1-cyano-2-[[3-(1H-tetrazol-5-yl)phenyl]methoxy]ethyl]-α-(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-methyl-, (αS)- (9C1) (CA INDEX NAME)

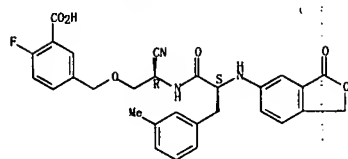
Absolute stereochemistry.



RN 374118-76-0 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[[[(2S)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

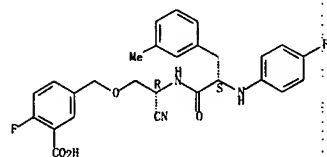
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



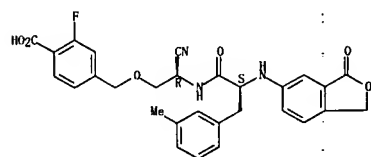
RN 374118-77-1 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[(2S)-2-[(4-fluorophenyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.



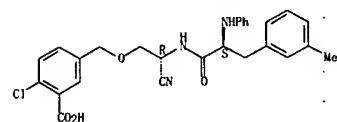
RN 374118-78-2 CAPLUS  
 CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[(2S)-2-[(1,3-dihydro-3-oxo-5-isobenzofuranyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.



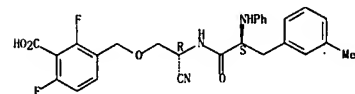
RN 374118-79-3 CAPLUS  
 CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



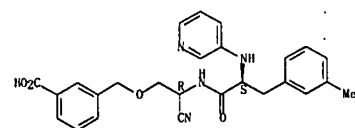
RN 374118-83-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2,6-difluoro- (CA INDEX NAME)

Absolute stereochemistry.



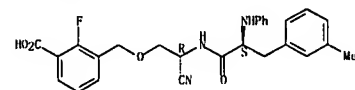
RN 374118-84-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(3-pyridinylamino)propyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-85-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2-fluoro- (CA INDEX NAME)

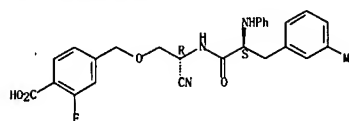
Absolute stereochemistry.



RN 374119-63-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[1-(phenylamino)cyclohexyl]carbonyl]amino]ethoxy]methyl]- (CA INDEX NAME)

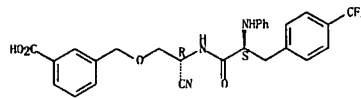
L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



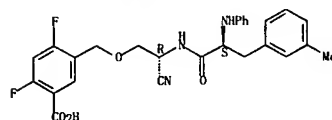
RN 374118-80-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-1-oxo-2-(phenylamino)-3-[4-(trifluoromethyl)phenyl]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 374118-81-7 CAPLUS  
 CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2,4-difluoro- (CA INDEX NAME)

Absolute stereochemistry.

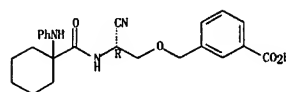


RN 374118-82-8 CAPLUS  
 CN Benzoic acid, 2-chloro-5-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

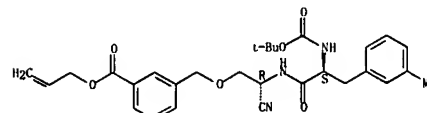
L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



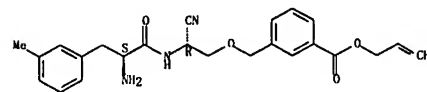
IT 225122-60-1P 225122-61-2P 374119-18-3P  
 374119-19-4P 374119-20-7P 374119-23-0P  
 374119-24-1P 374119-25-2P 374119-26-3P  
 374119-29-6P 374119-44-5P 374119-45-6P  
 374119-46-7P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of N-substituted peptidyl nitriles as cysteine cathepsin inhibitors)  
 RN 225122-60-1 CAPLUS  
 CN Benzoic acid, 3-[[[(4R,7S)-4-cyano-11,11-dimethyl-7-[(3-methylphenyl)methyl]-6,9-dioxo-2,10-dioxo-5,8-diazadodec-1-yl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-61-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-amino-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

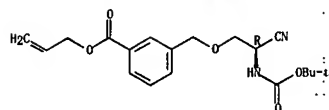
Absolute stereochemistry.



RN 374119-18-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[1-(1,1-dimethylethoxy)carbonyl]amino]ethoxy]methyl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

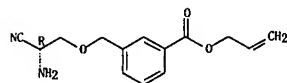
Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



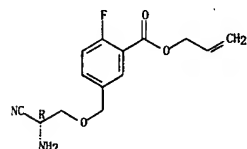
RN 374119-19-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-amino-2-cyanoethoxy]methyl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



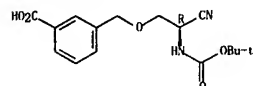
RN 374119-20-7 CAPLUS  
CN Benzoic acid, 5-[[[(2R)-2-amino-2-cyanoethoxy]methyl]-2-fluoro-, 2-propenyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



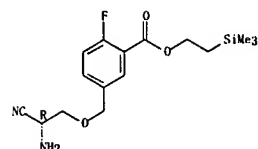
RN 374119-23-0 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(1,1-dimethylethoxy)carbonyl]amino]ethoxy]methyl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



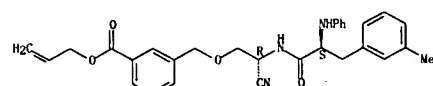
RN 374119-24-1 CAPLUS  
CN Carbamic acid, [(1R)-1-cyano-2-[[3-[[[(2-cyanoethyl)amino]carbonyl]phenyl]]methyl]-, 1,1-dimethylethyl ester (9C1) (CA INDEX NAME)

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



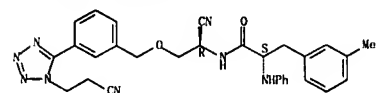
RN 374119-44-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-, 2-propenyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



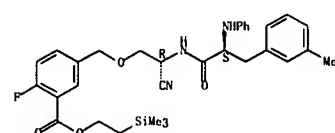
RN 374119-45-6 CAPLUS  
CN Benzenepropanamide, N-[(1R)-1-cyano-2-[[3-[[[(2-cyanoethyl)-1H-tetrazol-5-yl]phenyl]methoxy]ethyl]-3-methyl-4-(phenylamino)-, (4S)- (CA INDEX NAME)

Absolute stereochemistry.



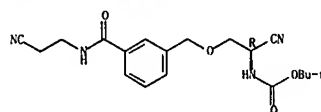
RN 374119-46-7 CAPLUS  
CN Benzoic acid, 5-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-(phenylamino)propyl]amino]ethoxy]methyl]-2-fluoro-, 2-(trimethylsilyl)ethyl ester (CA INDEX NAME)

Absolute stereochemistry.



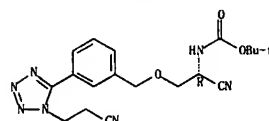
L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



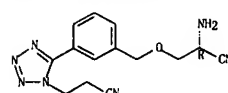
RN 374119-25-2 CAPLUS  
CN Carbamic acid, [(1R)-1-cyano-2-[[3-[[[(2-cyanoethyl)-1H-tetrazol-5-yl]phenyl]methoxy]ethyl]-, 1,1-dimethylethyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 374119-26-3 CAPLUS  
CN 1H-Tetrazole-1-propanenitrile, 5-[[3-[[[(2R)-2-amino-2-cyanoethoxy]methyl]phenyl]-, 1,1-dimethylethyl ester (CA INDEX NAME)

Absolute stereochemistry.



RN 374119-29-6 CAPLUS  
CN Benzoic acid, 5-[[[(2R)-2-amino-2-cyanoethoxy]methyl]-2-fluoro-, 2-(trimethylsilyl)ethyl ester (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 38 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

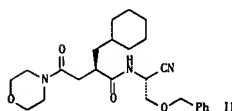
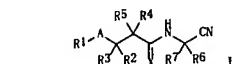
L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 2001:833854 CAPLUS  
 DOCUMENT NUMBER: 135:371749  
 TITLE: Preparation of succinic acid diamides as cysteine protease inhibitors  
 INVENTOR(S): Bekkali, Younes; Betageri, Rajashekar; Emmanuel, Michel Jose; Hickey, Eugene Richard; Liu, Weimin; Patel, Usha R.; Spero, Denise Mary; Thomson, David S.; Ward, Yancey David; Young, Erick Richard Roush USA  
 PATENT ASSIGNEE(S): U.S. Pat. Appl. Publ., 75 pp., Cont.-in-part of U.S. Ser. No. 627,869.  
 SOURCE: CODEN: USXXCO  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 2001041700	A1	20011115	US 2001-862674	20010522
US 6313117	B1	20011106	US 2000-627869	20000728
US 2003087939	A1	20030508	US 2002-278546	20021023
US 6649642	B2	20031118		

PRIORITY APPLN. INFO.: US 1999-146647P P 19990730  
 US 2000-627869 A2 20000728  
 US 2001-862674 A1 20010522

OTHER SOURCE(S): MARPAT 135:371749  
 GRAPHIC IMAGE:

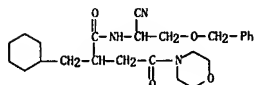


## ABSTRACT:

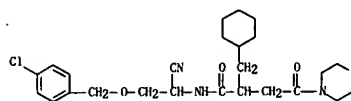
Title compds. [I]: A = CO, ROCH; R1 = (substituted) alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl, amino; R2 = H, alkyl, OH, alkoxy; R3, R4 = H, alkyl; R5 = H, alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl; R6 = H, alkyl optionally interrupted by 1-2 N, O, S; R7 = H, alkyl, alkyl interrupted by 1-2 N, O, S, cycloalkyl, aryl, heterocyclyl, aryl, heteroaryl, cyano; R6R7 = atoms to form a 4-7 membered heterocyclic or carbocyclic ring; R8 = H, alkyl, cycloalkyl, cycloalkylalkyl, aralkyl; X = O, S; were prepared as inhibitors of cysteine proteases such as cathepsins B, F, K, L, and S in the treatment of

L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)  
 autoimmune diseases, Alzheimer's disease, and atherosclerosis. Thus, (R)-2-(cyclohexylmethyl)-4-morpholin-4-yl-4-oxobutyric acid (prepn. given) in DMF at 0° was treated with EDC, 1-hydroxybenzotriazole, O-benzyl-L-serinamide.HCl, and N-methylmorpholine followed by stirring overnight to give N-(2-benzoyloxy-1-carbamoyl-ethyl)-2-cyclohexylmethyl-4-morpholin-4-yl-4-oxobutyramide. The latter was stirred 1 h with cyanuric chloride in DMF at 0° to give title compd. (II). I inhibited cathepsin S with IC50s 100 µM.

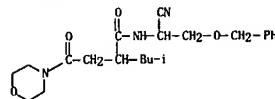
IT 324793-52-4P 324793-54-6P 324794-49-2P  
 324794-53-8P 324794-57-2P 324794-60-7P  
 324794-97-0P 324795-09-7P 324795-10-0P  
 324795-11-1P 324795-22-4P 324795-30-4P  
 324795-31-5P  
 RL: BAC (Biological) activity or effector, except adverse; RSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of succinic acid diamides as inhibitors of cysteine proteases (cathepsins) in the treatment of autoimmune diseases, Alzheimer's disease, and atherosclerosis)  
 RN 324793-52-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(cyclohexylmethyl)-γ-oxo- (CA INDEX NAME)



RN 324793-54-6 CAPLUS  
 CN 4-Morpholinebutanamide, N-[2-[(4-chlorophenyl)methoxy]-1-cyanoethyl]-α-(cyclohexylmethyl)-γ-oxo- (CA INDEX NAME)

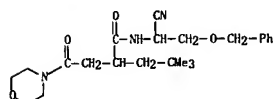


RN 324794-49-2 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(2-methylpropyl)-γ-oxo- (CA INDEX NAME)

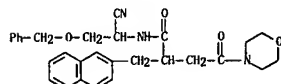


L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

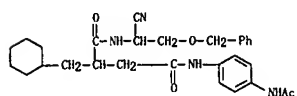
RN 324794-53-8 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(2,2-dimethylpropyl)-γ-oxo- (CA INDEX NAME)



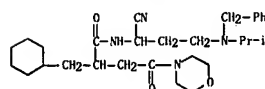
RN 324794-57-2 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(2-naphthalenylmethyl)-γ-oxo- (CA INDEX NAME)



RN 324794-60-7 CAPLUS  
 CN Butanediamide, N4-[4-(acetylamino)phenyl]-N1-[1-cyano-2-(phenylmethoxy)ethyl]-2-(cyclohexylmethyl)- (CA INDEX NAME)



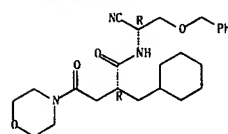
RN 324794-97-0 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-3-[(1-methylethyl)(phenylmethyl)amino]propyl]-α-(cyclohexylmethyl)-γ-oxo- (CA INDEX NAME)



RN 324795-09-7 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-α-(cyclohexylmethyl)-γ-oxo-, (αR)- (CA INDEX NAME)

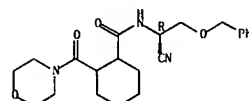
Absolute stereochemistry.

L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



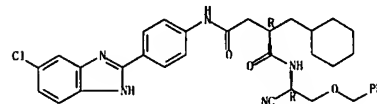
RN 324795-10-0 CAPLUS  
 CN Cyclohexanecarboxamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-(4-morpholinylcarbonyl)- (CA INDEX NAME)

Absolute stereochemistry.



RN 324795-11-1 CAPLUS  
 CN Butanediamide, N4-[4-(5-chloro-1H-benzimidazol-2-yl)phenyl]-N1-[1-cyano-2-(phenylmethoxy)ethyl]-2-(cyclohexylmethyl)-, (2R)- (9CI) (CA INDEX NAME)

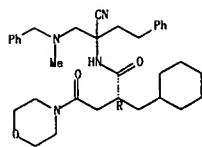
Absolute stereochemistry.



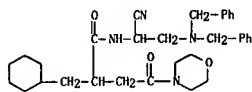
RN 324795-22-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-1-[(methyl(phenylmethyl)amino)methyl]-3-phenylpropyl]-α-(cyclohexylmethyl)-γ-oxo-, (αR)- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

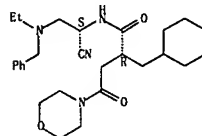


RN 324795-30-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[2-[(1S)-1-cyano-2-[[ethyl(phenylmethyl)amino]ethyl]-α-(cyclohexylmethyl)]-α-oxo- (CA INDEX NAME)



RN 324795-31-5 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1S)-1-cyano-2-[[ethyl(phenylmethyl)amino]ethyl]-α-(cyclohexylmethyl)]-α-oxo-, (αR)- (CA INDEX NAME)

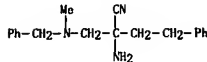
Absolute stereochemistry.



IT 324795-65-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of succinic acid diimides as inhibitors of cysteine proteases (cathepsins) in the treatment of autoimmune diseases, Alzheimer's disease, and atherosclerosis)

RN 324795-65-5 CAPLUS  
 CN Benzenebutanenitrile, α-amino-α-[[methyl(phenylmethyl)amino]methyl]- (CA INDEX NAME)

L4 ANSWER 39 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2001:823645 CAPLUS  
 DOCUMENT NUMBER: 136:95585  
 TITLE: Identification of Dipeptidyl Nitriles as Potent and Selective Inhibitors of Cathepsin B through Structure-Based Drug Design

AUTHOR(S): Greenspan, Paul D.; Clark, Kirk L.; Tommasi, Ruben A.; Cowen, Scott D.; McQuire, Leslie W.; Farley, David L.; van Duzer, John H.; Goldberg, Ronald L.; Zhou, Huangshi; Du, Zhengming; Pitt, John J.; Coppa, David E.; Fang, Zheng; Macchia, William; Zhu, Lijuan; Capparelli, Michael P.; Goldstein, Robert; Wigg, Andrew M.; Doughy, John R.; Bohacek, Regine S.; Knap, Ania K.

CORPORATE SOURCE: Arthritis and Bone Metabolism Research, Novartis Pharmaceuticals Corporation, Summit, NJ, 07901, USA  
 SOURCE: Journal of Medicinal Chemistry (2001), 44(26), 4524-4534

PUBLISHER: CODEN: JMCMAR; ISSN: 0022-2623  
 DOCUMENT TYPE: American Chemical Society  
 LANGUAGE: English  
 ABSTRACT:

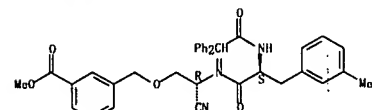
Cathepsin B is a member of the papain superfamily of cysteine proteases and has been implicated in the pathol. of numerous diseases, including arthritis and cancer. As part of an effort to identify potent, reversible inhibitors of this protease, we examined a series of dipeptidyl nitriles, starting with the previously reported Chz-Phe-NH-CH<sub>2</sub>CN (19, IC<sub>50</sub> = 62 nM). High-resolution x-ray crystallog. data and mol. modeling were used to optimize the P1, P2, and P3 substituents of this template. Cathepsin B is unique in its class in that it contains a carboxylate recognition site in the S2' pocket of the active site. Inhibitor potency and selectivity were enhanced by tethering a carboxylate functionality from the carbon α to the nitrile to interact with this region of the enzyme. This resulted in the identification of a compound, a 7 nM inhibitor of cathepsin B, with excellent selectivity over other cysteine cathepsins.

IT 225121-05-1P 225121-06-2P 225121-17-5P  
 225121-87-9P 225122-18-9P 389600-13-9P  
 389600-14-0P 389600-15-1P 389600-17-3P  
 389600-18-4P 389600-19-5P 389600-20-8P  
 389600-21-9P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of dipeptidyl nitriles as potent and selective inhibitors of cathepsin B through structure-based drug design)

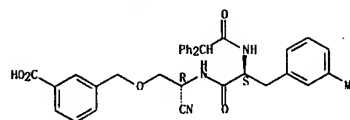
RN 225121-05-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-, methyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



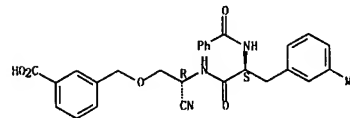
RN 225121-06-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



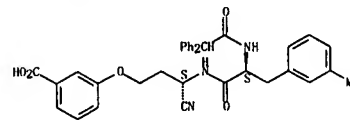
RN 225121-17-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-(benzoylamino)-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-87-9 CAPLUS  
 CN Benzoic acid, 3-[[[(3S)-3-cyano-3-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]propoxy]- (9C1) (CA INDEX NAME)

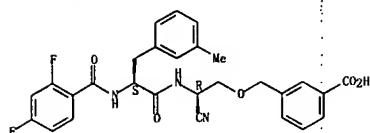
Absolute stereochemistry.



RN 225122-18-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[(2,4-difluorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

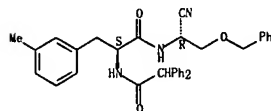
Absolute stereochemistry.

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



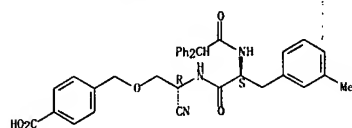
RN 389600-13-9 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 389600-14-0 CAPLUS  
 CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

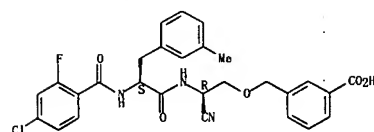
Absolute stereochemistry.



RN 389600-15-1 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-[[3-(hydroxymethyl)phenyl]methoxyethyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

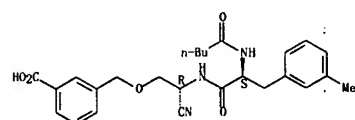
Absolute stereochemistry.

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



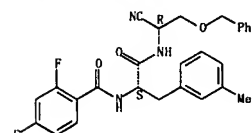
RN 389600-20-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3-methylphenyl)-1-oxo-2-[[1-oxopropyl]amino]propyl]amino]ethoxy]methyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 389600-21-9 CAPLUS  
 CN Benzenepropanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-α-[(2,4-difluorobenzoyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



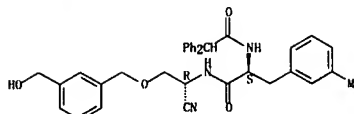
IT 225122-60-1P 225122-61-2P 225122-64-5P

374119-18-3P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of dipeptidyl nitriles as potent and selective inhibitors of cathepsin B through structure-based drug design)

RN 225122-60-1 CAPLUS  
 CN Benzoic acid, 3-[(4R,7S)-4-cyano-11,11-dimethyl-7-[(3-methylphenyl)methyl]-6,9-dioxo-2,10-dioxo-5,8-diazadodec-1-yl]-, 2-propenyl ester (9CI) (CA INDEX NAME)

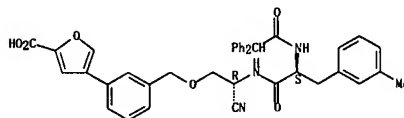
Absolute stereochemistry.

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



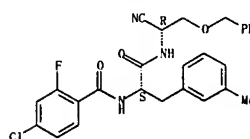
RN 389600-17-3 CAPLUS  
 CN 2-Furancarboxylic acid, 4-[3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 389600-18-4 CAPLUS  
 CN Benzenepropanamide, α-[(4-chloro-2-fluorobenzoyl)amino]-N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

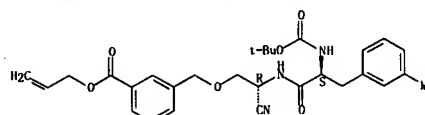
Absolute stereochemistry.



RN 389600-19-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chloro-2-fluorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]-α-[(diphenylacetyl)amino]-3-methyl-, (αS)- (9CI) (CA INDEX NAME)

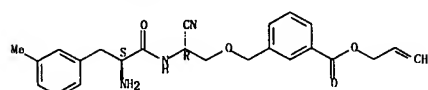
Absolute stereochemistry.

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

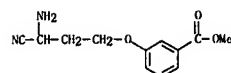


RN 225122-61-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-amino-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]-, 2-propenyl ester (9CI) (CA INDEX NAME)

Absolute stereochemistry.

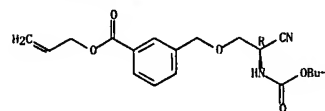


RN 225122-64-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-amino-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]-, 2-propenyl ester (9CI) (CA INDEX NAME)



RN 374119-18-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(1,1-dimethylethoxy)carbonyl]amino]ethoxy]methyl]-, 2-propenyl ester (9CI) (CA INDEX NAME)

Absolute stereochemistry.



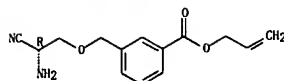
IT 374119-19-4P 389600-22-0P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation of dipeptidyl nitriles as potent and selective inhibitors of cathepsin B through structure-based drug design)

RN 374119-19-4 CAPLUS

CN Benzoic acid, 3-[[[(2R)-2-amino-2-cyanoethoxy]methyl]-, 2-propenyl ester (9CI) (CA INDEX NAME)

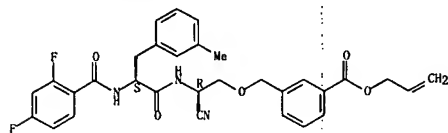
Absolute stereochemistry.

L4 ANSWER 40 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 389600-22-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(2,4-difluorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-, 2-propenyl ester (9C1)  
 (CA INDEX NAME)

Absolute stereochemistry.



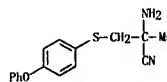
REFERENCE COUNT: 39 THERE ARE 39 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 41 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2001:746581 CAPLUS  
 DOCUMENT NUMBER: 136:167154  
 TITLE:  $\alpha$ -Alkyl- $\alpha$ -amino- $\beta$ -sulfone hydroxamates as potent MMP inhibitors that spare MMP-1  
 AUTHOR(S): Becker, D. P.; DeCrescenzo, G.; Fraskos, J.; Getman, D. P.; Hockerman, S. L.; Li, M.; Mohita, P.; Munie, G. E.; Swearingen, C.  
 CORPORATE SOURCE: Research and Development, Departments of Medicinal Chemistry and Inflammation-Oncology, Pharmacia, Skokie, IL, 60077, USA  
 SOURCE: Bioorganic & Medicinal Chemistry Letters (2001), 11(20), 2723-2725  
 CODEN: BMCLER; ISSN: 0950-894X  
 PUBLISHER: Elsevier Science Ltd.  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 136:167154

ABSTRACT:  
 A series of  $\alpha$ -alkyl- $\alpha$ -amino- $\beta$ -sulfonyl hydroxamates HONHCOCR1(NR2R3)CH2SO2C6H4XPh-4 [R1 = Me, R2 = H, Ac, Me, Et, CH2Ph, CH2CH2Ph, 3,4-methylenedioxybenzyl, 2-naphthylmethyl, propargyl, pyrrolidinomethyl, R3 = H, X = O; R1-R3 = Me, X = O; R1 = Me, R2 = H, Ac, R3 = H, X = S; R1 = Ph, R2 = Bz, H, R3 = H, X = O; R1R2 = (CH2)3, R3 = propargyl, X = O] was prepared and evaluated for potency vs. MMP-2 and MMP-13, and for selectivity vs. MMP-1. Low nanomolar potency was obtained with selectivity vs. MMP-1 ranging from >10 to >1000. Selected compds. were orally bioavailable.

IT 397330-25-5P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT (Reactant or reagent)  
 (a-alkyl-a-amino-beta-sulfonyl hydroxamates as potent MMP inhibitors that spare MMP-1)  
 RN 397330-25-5 CAPLUS  
 CN Propanenitrile, 2-amino-2-methyl-3-[(4-phenoxyphenyl)thio]- (CA INDEX NAME)

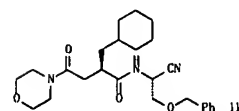
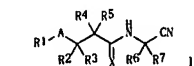


REFERENCE COUNT: 9 THERE ARE 9 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2001:101117 CAPLUS  
 DOCUMENT NUMBER: 134:163044  
 TITLE: Preparation of succinic acid diamides as cysteine protease inhibitors  
 INVENTOR(S): Bekkali, Younes; Betageri, Raj; Emmanuel, Michel; Hickey, Eugene; Liu, Weimin; Spero, Denise M.; Thomson, David S.; Ward, Yancey; Young, Erick R. R.; Patel, Usha  
 PATENT ASSIGNEE(S): Boehringer Ingelheim Pharmaceuticals, Inc., USA  
 SOURCE: PCT Int. Appl., 221 pp.  
 CODEN: P1XXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 200109110	A1	20010208	WO 2000-US20453	20000728
W: CA, JP, MX				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
CA 2379747	A1	20010208	CA 2000-2379747	20000728
EP 1204652	A1	20020515	EP 2000-950777	20000728
EP 1204652	B1	20060517		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL				
JP 2003506364	T	20030218	JP 2001-514313	20000728
AT 326454	T	20060615	AT 2000-950777	20000728
ES 2264937	T3	20070201	ES 2000-950777	20000728
MX 2002PA01014	A	20020812	MX 2002-PA1014	20020129
PRIORITY APPLN. INFO.:			US 1999-146647P	P 19990730
OTHER SOURCE(S):			WO 2000-US20453	W 20000728
GRAPHIC IMAGE:				



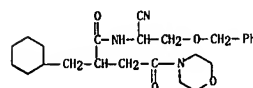
## ABSTRACT:

Title compds. [1: A = CO, RSOCH: R1 = (substituted) alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl, amino; R2 = H, alkyl, OH, alkoxy; R3, R4 = H, alkyl; R5 = H, alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl; R6 = H, alkyl optionally interrupted by 1-2 N, O, S; R7 = H, alkyl, alkyl interrupted by 1-2 N, O, S, cycloalkyl, aryl, heterocyclyl, aryl, heteroaryl, cyano; RSR7 = atoms

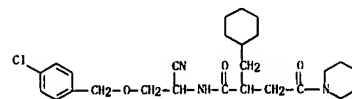
L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

to form a 4-7 membered heterocyclic or carbocyclic ring; R8 = H, alkyl, cycloalkyl, cycloalkylalkyl, aralkyl; X = O, S], were prepd. s inhibitors of cysteine proteases such as cathepsins B, F, K, L, and S in the treatment of autoimmune diseases, Alzheimer's disease, and atherosclerosis. Thus, (R)-2-cyclohexylmethyl-4-morpholin-4-yl-4-oxobutyric acid (prepn. given) in DMF at 0° was treated with EDC, 1-hydroxybenzotriazole, O-benzyl-L-serinamide, and N-methylmorpholine followed by stirring overnight to give N-(2-benzoyloxy-1-carbamoyl-ethyl)-2-cyclohexylmethyl-4-morpholin-4-yl-oxobutyramide. The latter was stirred 1 h with cyanuric chloride in DMF at 0° to give title compd. (II). I inhibited cathepsin S with IC50s 100  $\mu$ M.

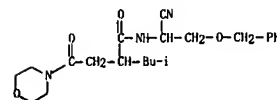
IT 324793-52-4P 324793-54-6P 324794-49-2P  
 324794-53-8P 324794-57-2P 324794-60-7P  
 324794-97-0P 324795-09-7P 324795-10-0P  
 324795-11-1P 324795-22-4P 324795-30-4P  
 324795-31-5P  
 RL: BAC (Biological activity or effector, except adversal): BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of succinic acid diamides as inhibitors of cysteine proteases (cathepsins) in the treatment of autoimmune diseases, Alzheimer's disease, and atherosclerosis)  
 RN 324793-52-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]- $\alpha$ -(cyclohexylmethyl)- $\gamma$ -oxo- (CA INDEX NAME)



RN 324793-54-6 CAPLUS  
 CN 4-Morpholinebutanamide, N-[2-[(4-chlorophenyl)methoxy]-1-cyanoethyl]- $\alpha$ -(cyclohexylmethyl)- $\gamma$ -oxo- (CA INDEX NAME)

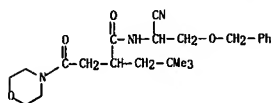


RN 324794-49-2 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]- $\alpha$ -(2-methylpropyl)- $\gamma$ -oxo- (CA INDEX NAME)

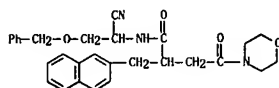




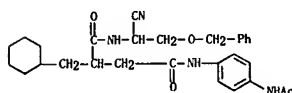
L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 RN 324794-53-8 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(2,2-dimethylpropyl)-γ-oxo- (CA INDEX NAME)



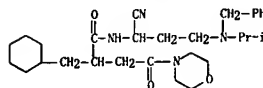
RN 324794-57-2 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-2-(phenylmethoxy)ethyl]-α-(2-naphthalenylmethyl)-γ-oxo- (CA INDEX NAME)



RN 324794-60-7 CAPLUS  
 CN Butanediamide, N4-[4-(acetamino)phenyl]-N1-[1-cyano-2-(phenylmethoxy)ethyl]-2-(cyclohexylmethyl)- (CA INDEX NAME)



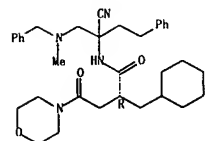
RN 324794-97-0 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-3-[(1-methylethyl)(phenylmethyl)amino]propyl]-α-(cyclohexylmethyl)-γ-oxo- (CA INDEX NAME)



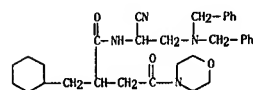
RN 324795-09-7 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-α-(cyclohexylmethyl)-γ-oxo-, (αR)- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

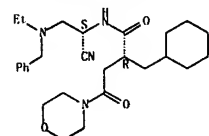


RN 324795-30-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[2-bis(phenylmethyl)amino]-1-cyanoethyl]-α-(cyclohexylmethyl)-γ-oxo- (CA INDEX NAME)

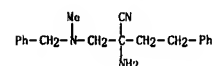


RN 324795-31-5 CAPLUS  
 CN 4-Morpholinebutanamide, N-[(1S)-1-cyano-2-[(ethyl)(phenylmethyl)amino]ethyl]-α-(cyclohexylmethyl)-γ-oxo-, (αR)- (CA INDEX NAME)

Absolute stereochemistry.

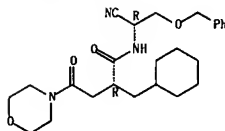


IT 324795-65-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of succinic acid diamides as inhibitors of cysteine proteases (cathepsins) in the treatment of autoimmune diseases, Alzheimer's disease, and atherosclerosis)  
 RN 324795-65-5 CAPLUS  
 CN Benzenebutanenitrile, α-amino-α-[[methyl(phenylmethyl)amino]methyl]- (CA INDEX NAME)



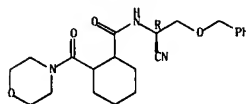
REFERENCE COUNT: 2 THERE ARE 2 CITED REFERENCES AVAILABLE FOR THIS

L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



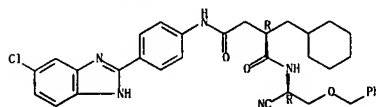
RN 324795-10-0 CAPLUS  
 CN Cyclohexanecarboxamide, N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-(4-morpholinylcarbonyl)- (CA INDEX NAME)

Absolute stereochemistry.



RN 324795-11-1 CAPLUS  
 CN Butanediamide, N4-[4-(5-chloro-1H-benzimidazol-2-yl)phenyl]-N1-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-2-(cyclohexylmethyl)-, (2R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 324795-22-4 CAPLUS  
 CN 4-Morpholinebutanamide, N-[1-cyano-1-[[methyl(phenylmethyl)amino]methyl]-3-phenylpropyl]-α-(cyclohexylmethyl)-γ-oxo-, (αR)- (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 42 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

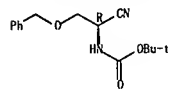
L4 ANSWER 43 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2000:772602 CAPLUS  
 DOCUMENT NUMBER: 133:322132  
 TITLE: Preparation of monomers and oligoureia peptidomimetics  
 INVENTOR(S): Boeijen, Astrid; Liskamp, Rob M. J.; Den Hartog, Jack A. J.  
 PATENT ASSIGNEE(S): Solvay Pharmaceuticals B.V., Neth.  
 SOURCE: PCT Int. Appl., 22 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000064865	A1	20001102	WO 2000-EP3735	20000419
W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
RW: GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, NG, SN, TD, TG				
AU 2000044030	A	20001110	AU 2000-44030	20000419
PRIORITY APPL. INFO.:			EP 1999-201268	A 19990423
			NL 1999-1011878	A 19990423
			WO 2000-EP3735	W 20000419

OTHER SOURCE(S): CASREACT 133:322132; MARPAT 133:322132  
 ABSTRACT:  
 Novel protected monomer building blocks BocNHCHRCH<sub>2</sub>NHCO<sub>2</sub>CGH4NO<sub>2</sub>-p (I: Boc = tert-butoxycarbonyl, R represents a side-chain of a natural or unnatural, common or uncommon amino acid in which optionally present functional groups are protected) were prepared and used in the solid-phase synthesis of oligoureia peptidomimetics. Thus, (S)-BocNHCHRCH<sub>2</sub>NHCO<sub>2</sub>CGH4NO<sub>2</sub>-p (I: R = Phe, Tyr, Leu, Ser, or Lys) were prepared from the Boc-amino acids via the amides. Nitriles 3 were subjected to hydrogenation over Raney Ni and reacted with ClCO<sub>2</sub>CGH4NO<sub>2</sub>-p in the presence of DiPEA and DCM to afford 1. 1 (R = H) was prepared directly from BocNHCH<sub>2</sub>CH<sub>2</sub>NH<sub>2</sub>. Urea dimer (S,S)-HO<sub>2</sub>CH(CH<sub>2</sub>CHMe<sub>2</sub>)NHCONHCH<sub>2</sub>CH<sub>2</sub>CH(CH<sub>2</sub>Ph)NH<sub>2</sub> and trimer (S,S,S)-HO<sub>2</sub>CH(CH<sub>2</sub>CHMe<sub>2</sub>)NHCONHCH<sub>2</sub>CH<sub>2</sub>CH(CH<sub>2</sub>Ph)NHCONHCH<sub>2</sub>CH<sub>2</sub>CH(CH<sub>2</sub>Ph)NH<sub>2</sub> were prepared by the solid-phase method using monomers 1.

IT 244778-26-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of monomers and oligoureia peptidomimetics)  
 RN 244778-26-5 CAPLUS  
 CN Carbamic acid, [1-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]-, 1,1-dimethylethyl ester (SC1) (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).



L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2000:628128 CAPLUS  
 DOCUMENT NUMBER: 133:208196  
 TITLE: Preparation of peptides as reversible inhibitors of cathepsin S  
 INVENTOR(S): Cywin, Charles L.; Frye, Leah L.; Morwick, Tina; Spero, Denise M.; Thomson, David; Ward, Yancey  
 PATENT ASSIGNEE(S): Boehringer Ingelheim Pharmaceuticals, Inc., USA  
 SOURCE: PCT Int. Appl., 315 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2000051998	A1	20000908	WO 1999-US26278	19991105
W: CA, JP, MX				
RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
CA 2360740	A1	20000908	CA 1999-2360740	19991105
EP 1159273	A1	20011205	EP 1999-973745	19991105
R: AT, BE, CH, DE, DK, ES, FR, GR, IE, IT, LU, NL, SE, MC, PT, IE, FI				
US 6395897	B1	20020528	US 1999-434106	19991105
JP 2002538151	T	20021112	JP 2000-602225	19991105
MX 2001PA08713	A	20020225	MX 2001-PA8713	20010828
US 2002091259	A1	20020711	US 2001-82952	20011024
US 6608057	B2	20030819		
US 2003158406	A1	20030821	US 2003-366282	20030213
US 6730671	B2	20040504		
PRIORITY APPL. INFO.:			US 1999-122570P	P 19990302
			US 1999-434106	A1 19991105
			WO 1999-US26278	W 19991105
			US 2001-82952	A3 20011024

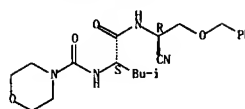
OTHER SOURCE(S): MARPAT 133:208196  
 ABSTRACT:  
 Compds. R1-A-NHCR2R3C(=O)NR4CR5R6R7 [A = C=O, C=S, C=NH or substituted imino group; R1 = (un)substituted alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl, amino; R2, R4 = H, alkyl; R3, R6 = H or (un)substituted alkyl, cycloalkyl, aryl, heterocyclyl, heteroaryl; R5 = H, alkyl, cycloalkyl; R7 = R8C(2), where Z = O, S, NH or substituted derivative and R8 is (un)substituted 5-8 membered monocyclic or 8-11 membered bicyclic heteroaryl having 1-4 heteroatoms selected from N, O and S; X = O, S, NOH] were prepared as cathepsin S inhibitors. Thus, morpholine-4-carboxylic acid [1-(S)-[1-(S)-cyano-3-phenylpropyl]carbamoyl]-3-methylbutylamide was prepared by coupling L-homophenylalaninamide with N-(4-morpholinecarbonyl)-L-leucine and reaction with cyanuric chloride. Compds. of the invention were evaluated for inhibition of cathepsin S (IC<sub>50</sub> ≤ 100 μM).

IT 290816-77-2P 290816-78-3P 290816-81-8P  
 290816-82-9P 290816-83-0P 290816-84-1P  
 290816-85-2P 290816-86-3P 290816-87-4P  
 290816-88-5P 290816-89-6P 290816-90-9P  
 290816-91-0P 290816-92-1P 290816-93-2P  
 290816-94-3P 290816-95-4P 290817-02-6P  
 290817-09-3P  
 RL: BAC (Biological activity or effector, except adverse); RSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)  
 (preparation of peptides as reversible inhibitors of cathepsin S)  
 RN 290816-77-2 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

L4 ANSWER 43 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 REFERENCE COUNT: 3 THERE ARE 3 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

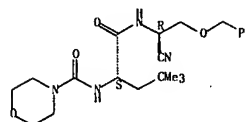
L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



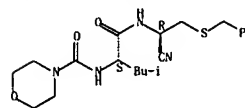
RN 290816-78-3 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



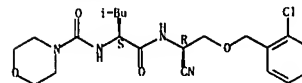
RN 290816-81-8 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethyl)thio]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



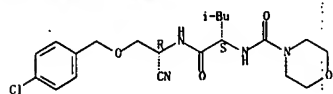
RN 290816-82-9 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-[(2-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



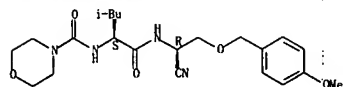
RN 290816-83-0 CAPLUS  
 CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-2-[(4-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
Absolute stereochemistry.



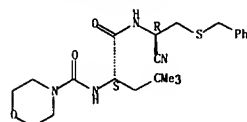
RN 290816-84-1 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(4-methoxyphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



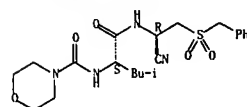
RN 290816-85-2 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(phenylmethyl)thio]ethyl]amino]carbonyl]-3,3-dimethylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.

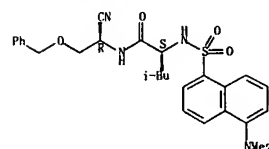


RN 290816-86-3 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(phenylmethyl)sulfonyl]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.

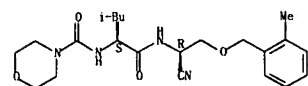


L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



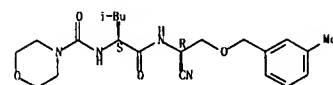
RN 290816-91-0 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(2-methylphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



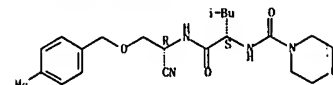
RN 290816-92-1 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(3-methylphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-93-2 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(4-methylphenyl)methoxy]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

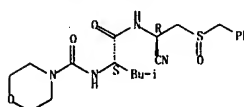
Absolute stereochemistry.



RN 290816-94-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-4-methyl-2-[(4-morpholinylcarbonyl)amino]-1-oxopentyl]amino]ethoxy]methyl]-, methyl ester (CA INDEX NAME)

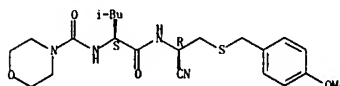
L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
RN 290816-87-4 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(phenylmethyl)sulfonyl]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



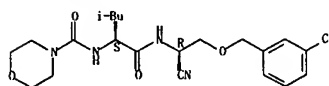
RN 290816-88-5 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(4-methoxyphenyl)methyl]thio]ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290816-89-6 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(3-chlorophenyl)methoxy]-1-cyanoethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.

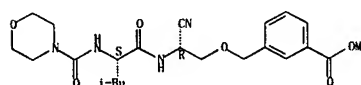


RN 290816-90-9 CAPLUS  
CN Pentanamide, N-[(1R)-1-cyano-2-[(phenylmethoxy)ethyl]amino]-4-methyl-, (2S)- (CA INDEX NAME)

Absolute stereochemistry.

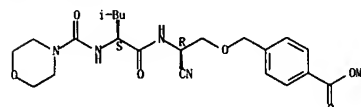


L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
Absolute stereochemistry.



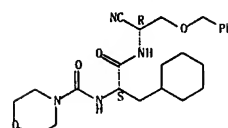
RN 290816-95-4 CAPLUS  
CN Benzoic acid, 4-[[[(2R)-2-cyano-2-[[[(2S)-4-methyl-2-[(4-morpholinylcarbonyl)amino]-1-oxopentyl]amino]ethoxy]methyl]-, methyl ester (CA INDEX NAME)

Absolute stereochemistry.



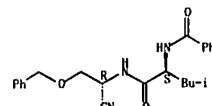
RN 290817-02-6 CAPLUS  
CN 4-Morpholinecarboxamide, N-[(1S)-2-[[[(1R)-1-cyano-2-[(phenylmethoxy)ethyl]amino]-1-(cyclohexylmethyl)-2-oxoethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 290817-09-3 CAPLUS  
CN Benzanide, N-[(1S)-1-[[[(1R)-1-cyano-2-[(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

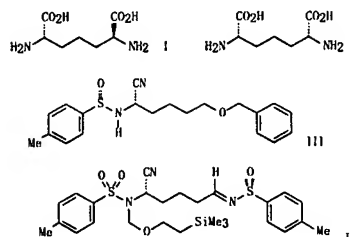
Absolute stereochemistry.



REFERENCE COUNT: 24 THERE ARE 24 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 44 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 45 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 2000:25585 CAPLUS  
 DOCUMENT NUMBER: 133:43221  
 TITLE: Asymmetric synthesis of (2S,6S)- and meso-(2S,6R)-diaminopimelic acids from enantiopure bis(sulfinimines)  
 AUTHOR(S): Davis, Franklin A.; Sriprajan, Vaidyanathan  
 CORPORATE SOURCE: Department of Chemistry, Temple University, Philadelphia, PA, 19122, USA  
 SOURCE: Journal of Organic Chemistry (2000), 65(10), 3248-3251  
 CODEN: JOCEAH; ISSN: 0022-3263  
 PUBLISHER: American Chemical Society  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 133:43221  
 GRAPHIC IMAGE:

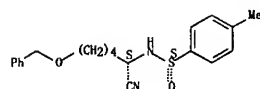


ABSTRACT:  
 The asym. synthesis of the title compds. I and II used the sulfinimine-mediated asym. Strecker synthesis including the utility of the N-tosyl group as an amino acid protecting group. Thus, addition of ethylaluminum cyanoisopropoxide to (S)-4-MeC6H4S(OMe)N:CH(CH2)4OCH2Ph gave the α-amino nitrile III with >96% diastereomeric excess; III was converted to I in eight steps via the sulfinimine IV.

IT 274694-67-6P 274694-68-7P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (asym. synthesis of diaminopimelic acids using the sulfinimine-mediated asym. Strecker synthesis)  
 RN 274694-67-6 CAPLUS  
 CN Benzenesulfinamide, N-[(1S)-1-cyano-5-(phenylmethoxy)pentyl]-4-methyl-, [S(S)]- (CA INDEX NAME)

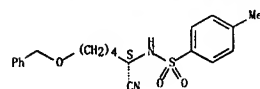
Absolute stereochemistry. Rotation (+).

L4 ANSWER 45 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 274694-68-7 CAPLUS  
 CN Benzenesulfinamide, N-[(1S)-1-cyano-5-(phenylmethoxy)pentyl]-4-methyl-, [S(S)]- (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).



REFERENCE COUNT: 38 THERE ARE 38 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1999:70844 CAPLUS  
 DOCUMENT NUMBER: 131:310455  
 TITLE: Preparation of aroylaminoacetonitriles as agricultural and horticultural insecticides  
 INVENTOR(S): Andoh, Nobuharu; Sanpei, Osamu; Sakata, Kazuyuki  
 PATENT ASSIGNEE(S): Nihon Nohyaku Co., Ltd., Japan  
 SOURCE: Eur. Pat. Appl., 63 pp.  
 CODEN: EPXKDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 953565	A2	19991103	EP 1999-107461	19990428
EP 953565	A3	20021204		
EP 953565	B1	20040908		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, WC, PT, IE, SI, LT, LV, FI, RO				
US 6239077	B1	20010529	US 1999-295319	19990421
TW 585849	B	20040501	TW 1999-88106732	19990427
EP 1445251	A1	20040811	EP 2004-10346	19990428
EP 1445251	B1	20061227		
R: CH, DE, FR, GB, IT, LI				
CN 1234177	A	19991110	CN 1999-105289	19990430
CN 1132516	B	20031231		
AU 9926027	A	19991111	AU 1999-26027	19990430
AU 752112	B2	20020905		
JP 2000026392	A	20000125	JP 1999-124560	19990430
PRIORITY APPL. INFO.:				
OTHER SOURCE(S): MARPAT 131:310455				

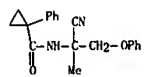
ABSTRACT:  
 Ar1QaCNR3C(CN)R4(CR5R6)w(CR7R8)hAr2 [I: Ar1, Ar2 = (substituted) Ph, PhO, pyridyl, pyridyloxy, naphthyl; Q = CR1R2; R1, R2 = H, halo, (halo)alkyl, (halo)alkoxy, (substituted) cycloalkyl; R1R2 = (substituted) C2-6 alkylene, CH=CH, C(ipibond), C: d = 0, 1; R3 = H, (halo)alkyl; R4-R8 = H, halo, (halo)alkyl; W = O, S, SO2, NR9; R9 = H, alkyl; a, b = 0-4], were prepared. Thus, 4-chlorophenol, bromoacetaldehyde di-Me acetal, K2CO3, and cat. NaI were refluxed 3 h in DMF to give 4-chlorophenoxyacetaldehyde di-Me acetal. This was refluxed with aqueous HCl in acetone to give crude 4-chlorophenoxyacetaldehyde, which was stirred with NaCN and NH4Cl in aqueous NH3 to give a residue. This was stirred with 4-chlorophenylacetyl chloride and Et3N in THF to give I (Ar1, Ar2 = 4-ClC6H4; R1-R8 = H; W = O; a, d = 1; b = 0). Numerous I at 500 ppm gave 100% kill of Plutella xylostella on cabbage seedlings.

IT 247197-13-3P 247197-14-4P 247197-15-5P  
 247197-16-6P 247197-17-7P 247197-18-8P  
 247197-20-2P 247197-22-4P 247197-35-9P  
 247197-37-1P 247197-39-3P 247197-41-7P  
 247197-43-9P 247197-45-1P 247197-56-4P  
 247197-57-5P 247197-62-2P 247197-63-3P  
 247197-64-4P 247197-65-5P 247197-66-6P  
 247197-67-7P 247197-68-8P 247197-70-2P  
 247197-71-3P 247197-72-4P 247197-73-5P  
 247197-74-6P 247197-75-7P 247197-76-8P  
 247197-77-9P 247197-78-0P 247197-79-1P  
 247197-80-4P 247197-81-5P 247197-82-6P  
 247197-86-0P 247197-87-1P 247197-88-2P  
 247197-89-3P 247197-90-6P 247197-96-2P  
 247197-97-3P 247197-98-4P 247197-99-5P  
 247198-00-1P 247198-01-2P 247198-02-3P  
 247198-03-4P 247198-04-5P 247198-05-6P

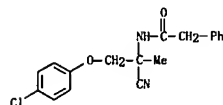
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

247198-06-7P 247198-07-8P 247198-08-9P  
 247198-09-0P 247198-10-3P 247198-11-4P  
 247198-12-5P 247198-13-6P 247198-14-7P  
 247198-15-8P 247198-16-9P 247198-17-0P  
 247198-18-1P 247198-19-2P 247198-20-5P  
 247198-21-6P 247198-22-7P 247198-23-8P  
 247198-24-9P 247198-25-0P 247198-26-1P  
 247198-27-2P 247198-28-3P 247198-29-4P  
 247198-30-7P 247198-31-8P 247198-32-9P  
 247198-33-0P 247198-34-1P 247198-35-2P  
 247198-36-3P 247198-37-4P 247198-38-5P  
 247198-39-6P 247198-40-9P 247198-41-0P  
 247198-43-2P 247198-44-3P 247198-45-4P  
 247198-46-5P 247198-47-6P 247198-48-7P  
 247198-49-8P 247198-50-1P 247198-51-2P  
 247198-52-3P 247198-57-8P 247198-58-9P  
 247198-59-0P 247198-60-3P 247198-61-4P  
 247198-62-5P 247198-64-7P 247198-65-8P  
 247198-66-9P 247198-67-0P 247198-68-1P  
 247198-69-2P 247198-70-5P 247198-71-6P  
 247198-72-7P 247198-73-8P 247198-74-9P  
 247198-75-0P 247198-76-1P 247198-77-2P  
 247198-78-3P 247198-79-4P 247198-80-7P  
 247198-81-8P 247198-82-9P 247198-83-0P  
 247198-84-1P 247198-85-2P 247198-86-3P  
 247198-87-4P 247198-88-5P 247198-89-6P  
 247198-90-9P 247198-91-0P 247198-92-1P  
 247198-93-2P 247198-94-3P 247198-95-4P  
 247198-96-5P 247198-97-6P 247198-98-7P  
 247198-99-8P 247199-00-4P 247199-01-5P  
 247199-02-6P 247199-03-7P 247199-04-8P  
 247199-05-9P 247199-06-0P 247199-09-3P  
 247199-10-6P 247199-11-7P 247199-12-8P  
 247199-13-9P 247199-14-0P 247199-15-1P  
 247199-16-2P 247199-17-3P 247199-18-4P  
 247199-19-5P 247199-20-8P 247199-21-9P  
 247199-22-0P 247199-23-1P 247199-24-2P  
 247199-25-3P 247199-27-5P 247199-28-6P  
 247199-29-7P 247199-30-0P 247199-31-1P  
 247199-32-2P 247199-33-3P 247199-34-4P  
 247199-36-6P 247199-37-7P 247199-38-8P  
 247199-39-9P 247199-40-2P 247199-41-3P  
 247199-42-4P 247199-43-5P 247199-44-6P  
 247199-45-7P 247199-46-8P 247199-47-9P  
 247199-48-0P 247199-49-1P 247199-50-4P  
 247199-51-5P 247199-52-6P 247199-54-8P  
 247199-55-9P 247199-56-0P 247199-57-1P  
 247199-58-2P 247199-59-3P 247199-60-6P  
 247199-61-7P 247199-62-8P 247199-63-9P  
 247199-64-0P 247199-65-1P 247199-66-2P  
 247199-67-3P 247199-68-4P 247199-69-5P  
 247199-70-8P 247199-71-9P 247199-72-0P  
 247199-73-1P 247199-74-2P 247199-75-3P  
 247199-76-4P 247199-77-5P 247199-78-6P  
 247199-79-7P 247199-80-0P 247199-81-1P  
 247199-85-5P 247199-86-6P 247199-87-7P  
 247199-88-8P 247199-89-9P 247199-90-2P  
 247199-92-4P 247199-93-5P 247199-94-6P  
 247199-95-7P 247201-37-2P  
 RL: AGR (Agricultural use); BAC (Biological activity or effector, except

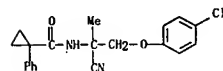
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (prepn. of aroylaminoacetoneitriles as agricultural and horticultural insecticides)  
 RN 247197-13-3 CAPLUS  
 CN Cyclopropanecarboxamide, N-(1-cyano-1-methyl-2-phenoxyethyl)-1-phenyl- (CA INDEX NAME)



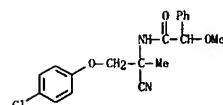
RN 247197-14-4 CAPLUS  
 CN Benzenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247197-15-5 CAPLUS  
 CN Cyclopropanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-phenyl- (CA INDEX NAME)

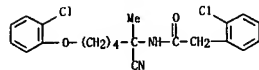


RN 247197-16-6 CAPLUS  
 CN Benzenecetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-o-methoxy- (CA INDEX NAME)

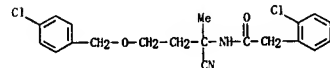


RN 247197-17-7 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[5-(2-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

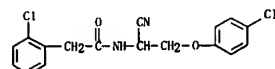
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



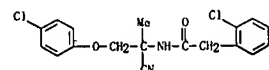
RN 247197-18-8 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[3-[(4-chlorophenyl)methoxy]-1-cyano-1-methylpropyl]- (CA INDEX NAME)



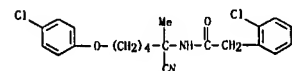
RN 247197-20-2 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyanoethyl]- (CA INDEX NAME)



RN 247197-22-4 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

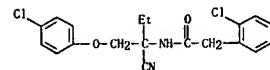


RN 247197-35-9 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

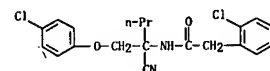


RN 247197-37-1 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)

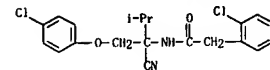
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



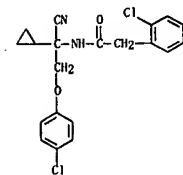
RN 247197-39-3 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]- (CA INDEX NAME)



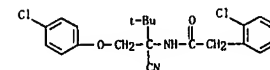
RN 247197-41-7 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



RN 247197-43-9 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)

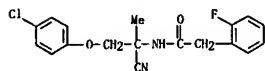


RN 247197-45-1 CAPLUS  
 CN Benzenecetamide, 2-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)

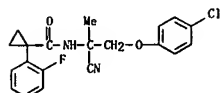


L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

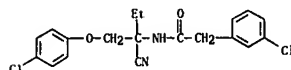
RN 247197-56-4 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2-fluoro-  
 (CA INDEX NAME)



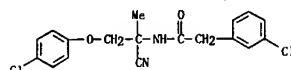
RN 247197-57-5 CAPLUS  
 CN Cyclopropanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(2-fluorophenyl)- (CA INDEX NAME)



RN 247197-62-2 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)



RN 247197-63-3 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

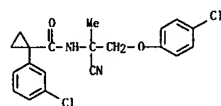


RN 247197-64-4 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

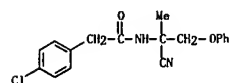


L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

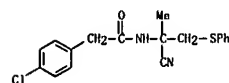
RN 247197-70-2 CAPLUS  
 CN Cyclopropanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(3-chlorophenyl)- (CA INDEX NAME)



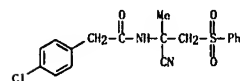
RN 247197-71-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-phenoxyethyl]- (CA INDEX NAME)



RN 247197-72-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(phenylthio)ethyl]- (CA INDEX NAME)

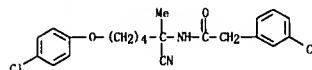


RN 247197-73-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(phenylsulfonyl)ethyl]- (CA INDEX NAME)

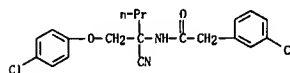


RN 247197-74-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]-

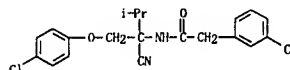
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



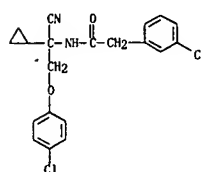
RN 247197-65-5 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]- (CA INDEX NAME)



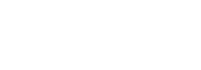
RN 247197-66-6 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



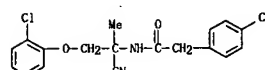
RN 247197-67-7 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)



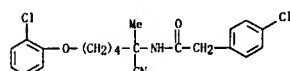
RN 247197-68-8 CAPLUS  
 CN Benzeneacetamide, 3-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)



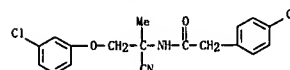
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



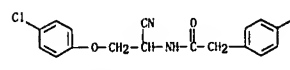
RN 247197-75-7 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)



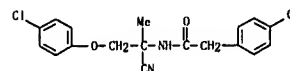
RN 247197-76-8 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(3-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247197-77-9 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyanoethyl]- (CA INDEX NAME)



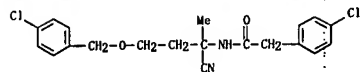
RN 247197-78-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



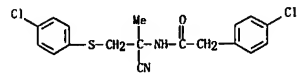
RN 247197-79-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[3-[(4-chlorophenyl)methoxy]-1-cyano-1-methylpropyl]- (CA INDEX NAME)



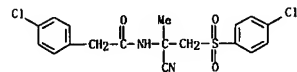
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



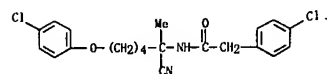
RN 247197-80-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-[(4-chlorophenyl)thio]-1-cyano-1-methylethyl]- (CA INDEX NAME)



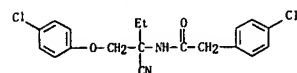
RN 247197-81-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-[(4-chlorophenyl)sulfonyl]-1-cyano-1-methylethyl]- (CA INDEX NAME)



RN 247197-82-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]- (CA INDEX NAME)

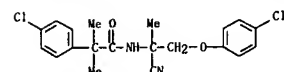


RN 247197-86-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]- (CA INDEX NAME)



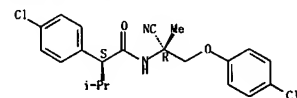
RN 247197-87-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



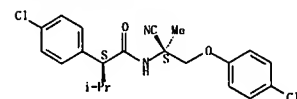
RN 247197-97-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[(1R)-2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-α-(1-methylethyl)-, (αS)-rel- (CA INDEX NAME)

Relative stereochemistry.

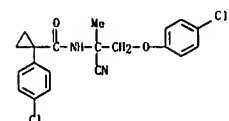


RN 247197-98-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[(1R)-2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-α-(1-methylethyl)-, (αR)-rel- (9C1) (CA INDEX NAME)

Relative stereochemistry.

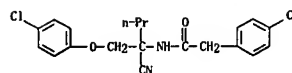


RN 247197-99-5 CAPLUS  
 CN Cyclopropanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)

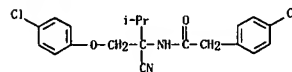


RN 247198-00-1 CAPLUS  
 CN Cyclobutanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)

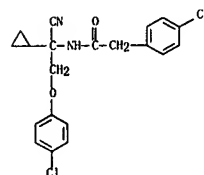
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



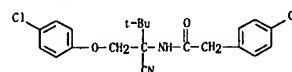
RN 247197-88-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]- (CA INDEX NAME)



RN 247197-89-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]- (CA INDEX NAME)

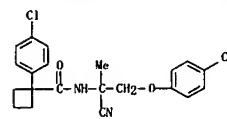


RN 247197-90-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]- (CA INDEX NAME)

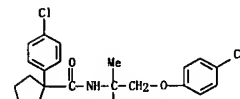


RN 247197-96-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-α,α-dimethyl- (CA INDEX NAME)

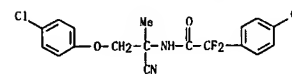
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



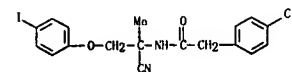
RN 247198-01-2 CAPLUS  
 CN Cyclopentanecarboxamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-1-(4-chlorophenyl)- (CA INDEX NAME)



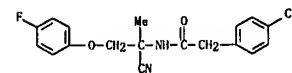
RN 247198-02-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-α,α-difluoro- (CA INDEX NAME)



RN 247198-03-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]- (CA INDEX NAME)

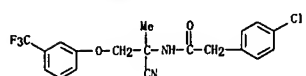


RN 247198-04-5 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]- (CA INDEX NAME)

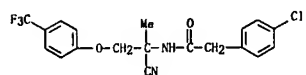


RN 247198-05-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[3-(4-chlorophenoxy)propyl]-1-cyano-1-methyl-2-[3-(4-chlorophenoxy)propyl]- (CA INDEX NAME)

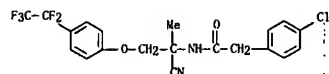
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



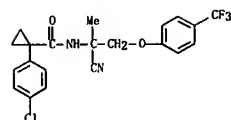
RN 247198-06-7 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247198-07-8 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(pentafluoroethyl)phenoxy]ethyl]- (9C1) (CA INDEX NAME)

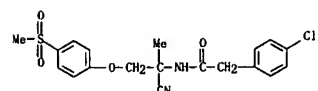


RN 247198-08-9 CAPLUS  
CN Cyclopropanecarboxamide, 1-(4-chlorophenyl)-N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]- (CA INDEX NAME)

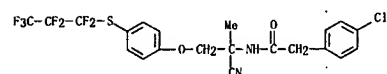


RN 247198-09-0 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-(heptafluoropropyl)phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

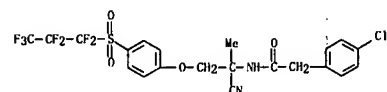
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



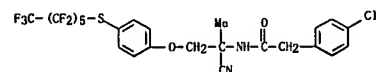
RN 247198-15-8 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-[(heptafluoropropyl)thio]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



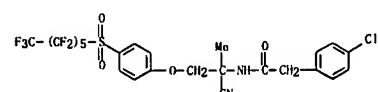
RN 247198-16-9 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-[(heptafluoropropyl)sulfonyl]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



RN 247198-17-0 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[(tridecafluoroethyl)thio]phenoxy]ethyl]- (9C1) (CA INDEX NAME)

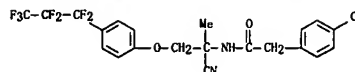


RN 247198-18-1 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[(tridecafluoroethyl)sulfonyl]phenoxy]ethyl]- (9C1) (CA INDEX NAME)

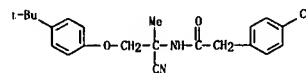


RN 247198-19-2 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-[[5-(trifluoromethyl)-

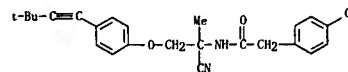
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



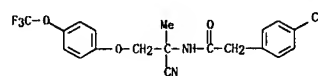
RN 247198-10-3 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-(1,1-dimethylethyl)phenoxy]-1-methylethyl]- (CA INDEX NAME)



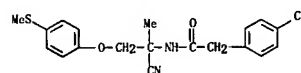
RN 247198-11-4 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-[4-(3,3-dimethyl-1-butyryl)phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)



RN 247198-12-5 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]- (CA INDEX NAME)

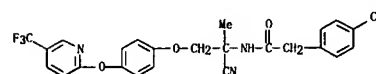


RN 247198-13-6 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(methylthio)phenoxy]ethyl]- (CA INDEX NAME)

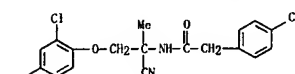


RN 247198-14-7 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(methylsulfonyl)phenoxy]ethyl]- (CA INDEX NAME)

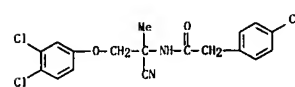
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
2-pyridinyloxy]phenoxy]ethyl]- (CA INDEX NAME)



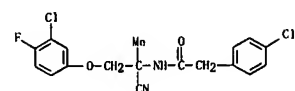
RN 247198-20-5 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



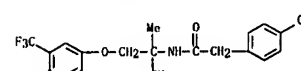
RN 247198-21-6 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-2-(3,4-dichlorophenoxy)-1-methylethyl]- (CA INDEX NAME)



RN 247198-22-7 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[2-(3-chloro-4-fluorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



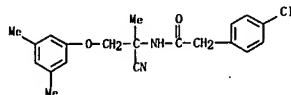
RN 247198-23-8 CAPLUS  
CN Benzenecetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-nitro-3-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



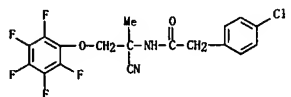
RN 247198-24-9 CAPLUS



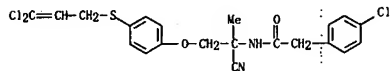
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-(3,5-dimethoxyphenoxy)-1-methylethyl]- (CA INDEX NAME)



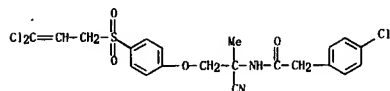
RN 247198-25-0 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(pentafluorophenoxy)ethyl]- (9C1) (CA INDEX NAME)



RN 247198-26-1 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)thio]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

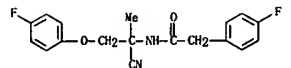


RN 247198-27-2 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)sulfonyl]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

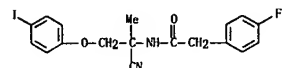


RN 247198-28-3 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-2-[2,6-dichloro-4-[(3,3-dichloro-2-propenyl)oxy]phenoxy]-1-methylethyl]- (9C1) (CA INDEX NAME)

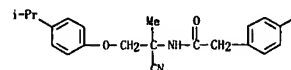
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



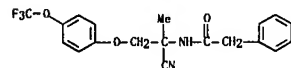
RN 247198-34-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)



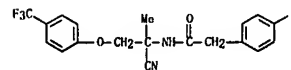
RN 247198-35-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(1-methylethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)



RN 247198-36-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

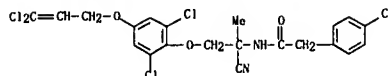


RN 247198-37-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

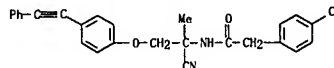


RN 247198-38-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-cyanophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)

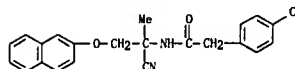
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



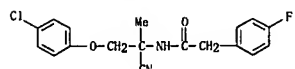
RN 247198-29-4 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(phenylethynyl)phenoxy]ethyl]- (9C1) (CA INDEX NAME)



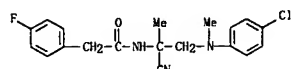
RN 247198-30-7 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-(2-naphthalenyloxy)ethyl]- (CA INDEX NAME)



RN 247198-31-8 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)

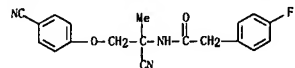


RN 247198-32-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenyl)methylamino]-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)

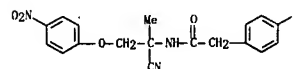


RN 247198-33-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-fluoro- (CA INDEX NAME)

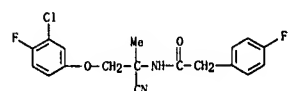
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



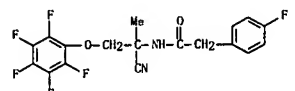
RN 247198-39-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-(4-nitrophenoxy)ethyl]-4-fluoro- (CA INDEX NAME)



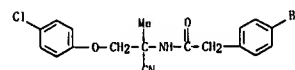
RN 247198-40-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(3-chloro-4-fluorophenoxy)-1-cyano-1-methylethyl]-4-fluoro- (CA INDEX NAME)



RN 247198-41-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-(pentafluorophenoxy)ethyl]-4-fluoro- (9C1) (CA INDEX NAME)

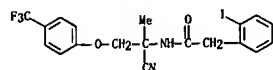


RN 247198-43-2 CAPLUS  
 CN Benzeneacetamide, 4-bromo-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

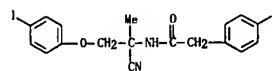


RN 247198-44-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-iodo- (CA INDEX NAME)

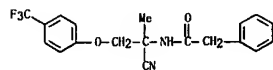
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



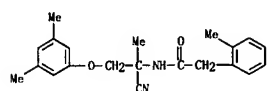
RN 247198-45-4 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-iodo- (CA INDEX NAME)



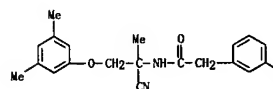
RN 247198-46-5 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-iodo- (CA INDEX NAME)



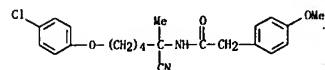
RN 247198-47-6 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-2-methyl- (CA INDEX NAME)



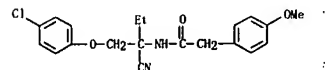
RN 247198-48-7 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-3-methyl- (CA INDEX NAME)



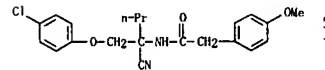
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



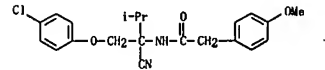
RN 247198-58-9 CAPLUS  
CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanopropyl]-4-methoxy- (CA INDEX NAME)



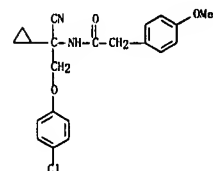
RN 247198-59-0 CAPLUS  
CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanobutyl]-4-methoxy- (CA INDEX NAME)



RN 247198-60-3 CAPLUS  
CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2-methylpropyl]-4-methoxy- (CA INDEX NAME)

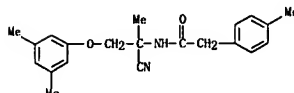


RN 247198-61-4 CAPLUS  
CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-cyclopropylethyl]-4-methoxy- (CA INDEX NAME)

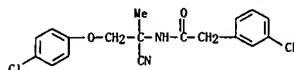


L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

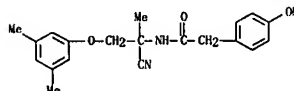
RN 247198-49-8 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-4-methyl- (CA INDEX NAME)



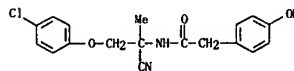
RN 247198-50-1 CAPLUS  
CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-51-2 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(3,5-dimethylphenoxy)-1-methylethyl]-4-methoxy- (CA INDEX NAME)



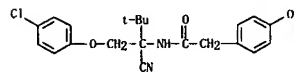
RN 247198-52-3 CAPLUS  
CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-methoxy- (CA INDEX NAME)



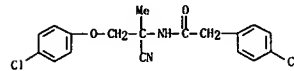
RN 247198-57-8 CAPLUS  
CN Benzeneacetamide, N-[5-(4-chlorophenoxy)-1-cyano-1-methylpentyl]-4-methoxy- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

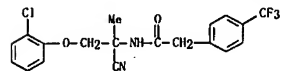
RN 247198-62-5 CAPLUS  
CN Benzeneacetamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]-4-methoxy- (CA INDEX NAME)



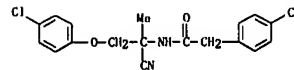
RN 247198-64-7 CAPLUS  
CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(heptafluoropropyl)- (9CI) (CA INDEX NAME)



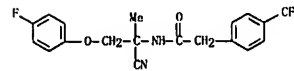
RN 247198-65-8 CAPLUS  
CN Benzeneacetamide, N-[2-(2-chlorophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-66-9 CAPLUS  
CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

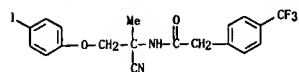


RN 247198-67-0 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

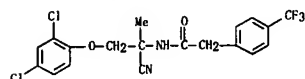


RN 247198-68-1 CAPLUS  
CN Benzeneacetamide, N-[1-cyano-2-(4-iodophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

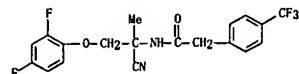
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



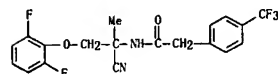
RN 247198-69-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,4-dichlorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



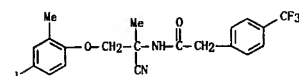
RN 247198-70-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,4-difluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247198-71-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(2,6-difluorophenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

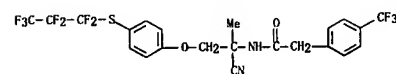


RN 247198-72-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-iodo-2-methylphenoxy)-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

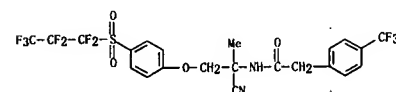


L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

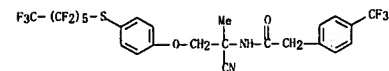
RN 247198-78-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-(heptafluoropropyl)thio]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



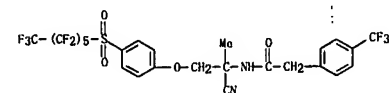
RN 247198-79-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-(heptafluoropropyl)sulfonyl]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



RN 247198-80-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)thio]phenoxy]ethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



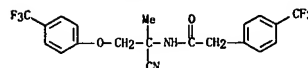
RN 247198-81-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-[(tridecafluorohexyl)sulfonyl]phenoxy]ethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



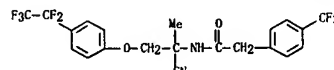
RN 247198-82-9 CAPLUS  
 CN Benzoic acid, 4-[2-cyano-2-[[[4-(trifluoromethyl)phenyl]acetyl]amino]propoxy]-, methyl ester (9CI) (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

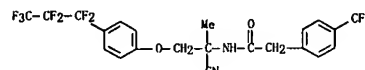
RN 247198-73-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



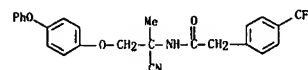
RN 247198-74-9 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(pentafluoroethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



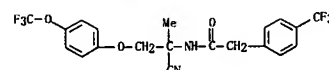
RN 247198-75-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-(heptafluoropropyl)phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



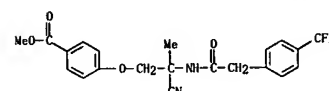
RN 247198-76-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(phenoxyphenoxy)ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



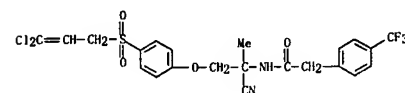
RN 247198-77-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



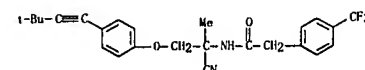
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



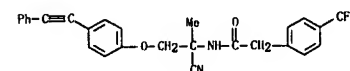
RN 247198-83-0 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-[(3,3-dichloro-2-propenyl)sulfonyl]phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



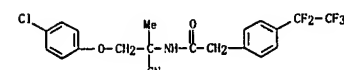
RN 247198-84-1 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-[4-[(3,3-dimethyl-1-butynyl)phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



RN 247198-85-2 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(phenylethynyl)phenoxy]ethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

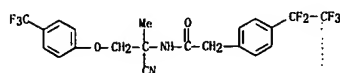


RN 247198-86-3 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(pentafluoroethyl)- (9CI) (CA INDEX NAME)

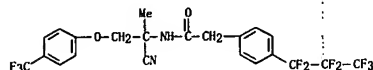


RN 247198-87-4 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(pentafluoroethyl)- (9CI) (CA INDEX NAME)

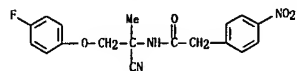
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



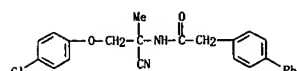
RN 247198-88-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(heptafluoropropyl)- (9C1) (CA INDEX NAME)



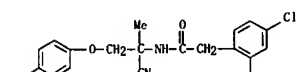
RN 247198-89-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-4-nitro- (CA INDEX NAME)



RN 247198-90-9 CAPLUS  
 CN [1,1'-Biphenyl]-4-acetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

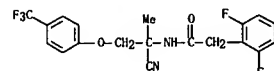


RN 247198-91-0 CAPLUS  
 CN Benzeneacetamide, 2,4-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

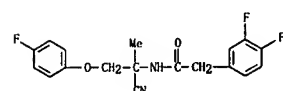


RN 247198-92-1 CAPLUS  
 CN Benzeneacetamide, 2,4-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

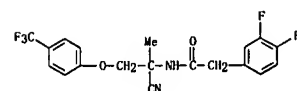
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



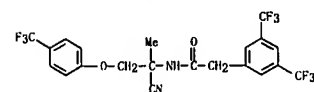
RN 247198-97-6 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-3,4-difluoro- (CA INDEX NAME)



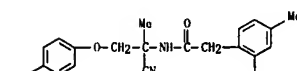
RN 247198-98-7 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3,4-difluoro- (CA INDEX NAME)



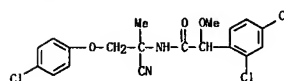
RN 247198-99-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3,5-bis(trifluoromethyl)- (CA INDEX NAME)



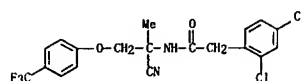
RN 247199-00-4 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2,4-dimethyl- (CA INDEX NAME)



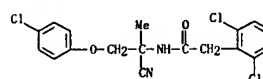
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



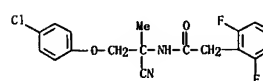
RN 247198-93-2 CAPLUS  
 CN Benzeneacetamide, 2,4-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247198-94-3 CAPLUS  
 CN Benzeneacetamide, 2,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



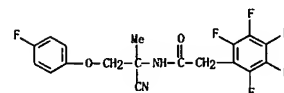
RN 247198-95-4 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-2,6-difluoro- (CA INDEX NAME)



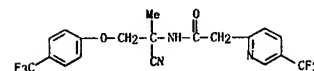
RN 247198-96-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2,6-difluoro- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

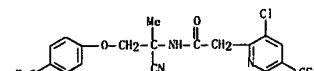
RN 247199-01-5 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-2-(4-fluorophenoxy)-1-methylethyl]-2,3,4,5,6-pentafluoro- (CA INDEX NAME)



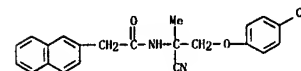
RN 247199-02-6 CAPLUS  
 CN 2-Pyridineacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)



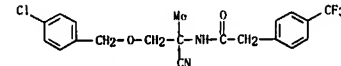
RN 247199-03-7 CAPLUS  
 CN 2-Pyridineacetamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)



RN 247199-04-8 CAPLUS  
 CN 2-Naphthaleneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

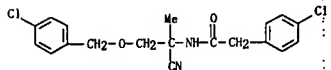


RN 247199-05-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)ethoxy]-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

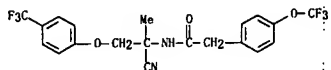


RN 247199-06-0 CAPLUS

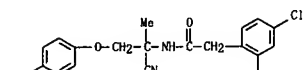
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CN Benzeneacetamide, 4-chloro-N-[2-[(4-chlorophenyl)methoxy]-1-cyano-1-methylethyl]- (CA INDEX NAME)



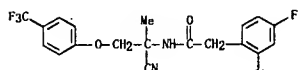
RN 247199-09-3 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



RN 247199-10-6 CAPLUS  
 CN Benzeneacetamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-fluoro- (CA INDEX NAME)

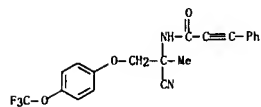


RN 247199-11-7 CAPLUS  
 CN Benzeneacetamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

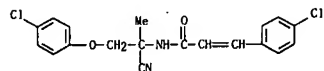


RN 247199-12-8 CAPLUS  
 CN Benzeneacetamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2,4-difluoro- (CA INDEX NAME)

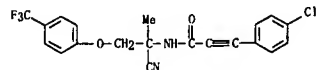
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



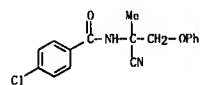
RN 247199-17-3 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-(4-chlorophenyl)- (CA INDEX NAME)



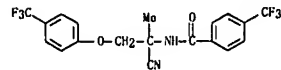
RN 247199-18-4 CAPLUS  
 CN 2-Propenamide, 3-[(4-chlorophenyl)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-19-5 CAPLUS  
 CN Benzamide, 4-chloro-N-[1-cyano-1-methyl-2-phenoxyethyl]- (CA INDEX NAME)

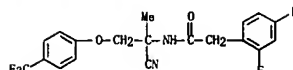


RN 247199-20-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

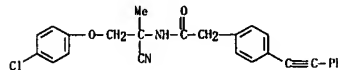


RN 247199-21-9 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3-(trifluoromethyl)- (CA INDEX NAME)

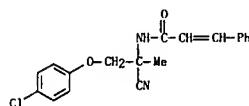
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



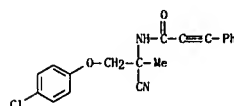
RN 247199-13-9 CAPLUS  
 CN Benzeneacetamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-4-(phenylethynyl)- (9CI) (CA INDEX NAME)



RN 247199-14-0 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-phenyl- (CA INDEX NAME)

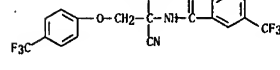


RN 247199-15-1 CAPLUS  
 CN 2-Propenamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3-phenyl- (CA INDEX NAME)

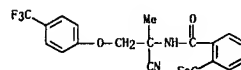


RN 247199-16-2 CAPLUS  
 CN 2-Propenamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-3-phenyl- (CA INDEX NAME)

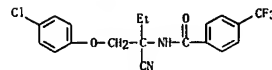
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



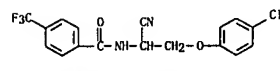
RN 247199-22-0 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(trifluoromethyl)- (CA INDEX NAME)



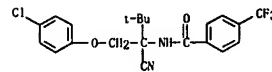
RN 247199-23-1 CAPLUS  
 CN Benzamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyanoethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



RN 247199-24-2 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1-cyanoethyl]-4-(trifluoromethyl)- (CA INDEX NAME)

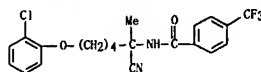


RN 247199-25-3 CAPLUS  
 CN Benzamide, N-[1-[(4-chlorophenoxy)methyl]-1-cyano-2,2-dimethylpropyl]-4-(trifluoromethyl)- (CA INDEX NAME)

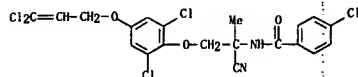


RN 247199-27-5 CAPLUS  
 CN Benzamide, N-[5-(2-chlorophenoxy)-1-cyano-1-methylpentyl]-4-(trifluoromethyl)- (CA INDEX NAME)

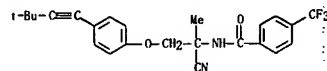
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



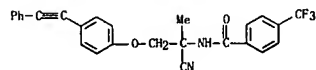
RN 247199-28-6 CAPLUS  
 CN Benzamide, 4-chloro-N-[1-cyano-2-[2,6-dichloro-4-[(3,3-dichloro-2-propenyl)oxy]phenoxy]-1-methylethyl]- (9CI) (CA INDEX NAME)



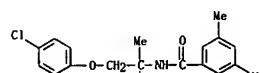
RN 247199-29-7 CAPLUS  
 CN Benzamide, N-[1-cyano-2-[4-(3,3-dimethyl-1-butenyl)phenoxy]-1-methylethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



RN 247199-30-0 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(phenylethynyl)phenoxy]ethyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)



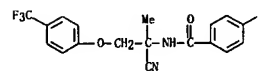
RN 247199-31-1 CAPLUS  
 CN Benzamide, N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]-3,5-dimethyl- (CA INDEX NAME)



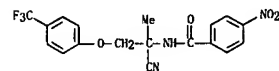
RN 247199-32-2 CAPLUS

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

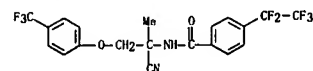
RN 247199-38-8 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-iodo- (CA INDEX NAME)



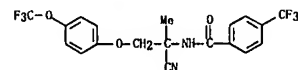
RN 247199-39-9 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-nitro- (CA INDEX NAME)



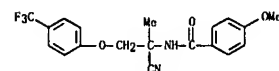
RN 247199-40-2 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(pentafluoromethyl)- (9CI) (CA INDEX NAME)



RN 247199-41-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethoxy)phenoxy]ethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



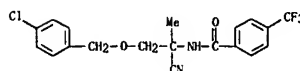
RN 247199-42-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-methoxy- (CA INDEX NAME)



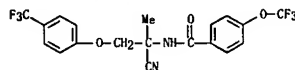
RN 247199-43-5 CAPLUS  
 CN Benzamide, 4-cyano-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

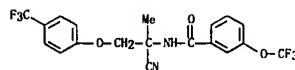
RN 247199-33-3 CAPLUS  
 CN Benzamide, N-[2-[4-(4-chlorophenyl)ethoxy]-1-cyano-1-methylethyl]-4-(trifluoromethyl)- (CA INDEX NAME)



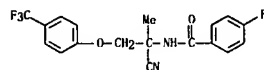
RN 247199-33-3 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(trifluoromethoxy)- (CA INDEX NAME)



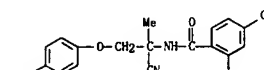
RN 247199-34-4 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-3-(trifluoromethoxy)- (CA INDEX NAME)



RN 247199-35-6 CAPLUS  
 CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-fluoro- (CA INDEX NAME)

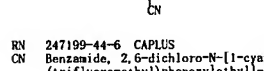


RN 247199-37-7 CAPLUS  
 CN Benzamide, 2,4-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

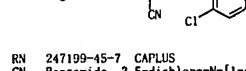


L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

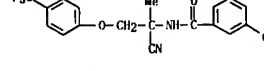
RN 247199-44-6 CAPLUS  
 CN Benzamide, 2,6-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



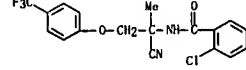
RN 247199-45-7 CAPLUS  
 CN Benzamide, 3,5-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



RN 247199-46-8 CAPLUS  
 CN Benzamide, 2-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

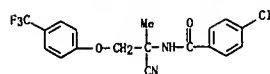


RN 247199-47-9 CAPLUS  
 CN Benzamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

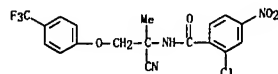


RN 247199-48-0 CAPLUS  
 CN Benzamide, 4-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

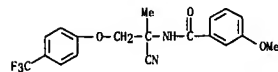
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



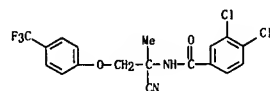
RN 247199-49-1 CAPLUS  
 CN Benzamide, 2-chloro-N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]-4-nitro- (CA INDEX NAME)



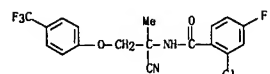
RN 247199-50-4 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-3-methoxy- (CA INDEX NAME)



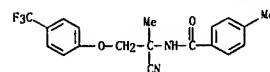
RN 247199-51-5 CAPLUS  
 CN Benzamide, 3,4-dichloro-N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]- (CA INDEX NAME)



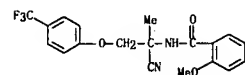
RN 247199-52-6 CAPLUS  
 CN Benzamide, 2-chloro-N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]-4-fluoro- (CA INDEX NAME)



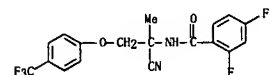
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



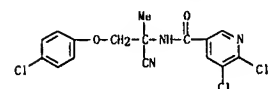
RN 247199-59-3 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-2-methoxy- (CA INDEX NAME)



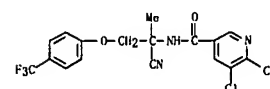
RN 247199-60-6 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-2,4-difluoro- (CA INDEX NAME)



RN 247199-61-7 CAPLUS  
 CN 3-Pyridinecarboxamide, 5,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



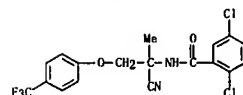
RN 247199-62-8 CAPLUS  
 CN 3-Pyridinecarboxamide, 5,6-dichloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



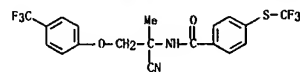
RN 247199-63-9 CAPLUS  
 CN 3-Pyridinecarboxamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

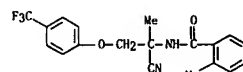
RN 247199-54-8 CAPLUS  
 CN Benzamide, 2,5-dichloro-N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]- (CA INDEX NAME)



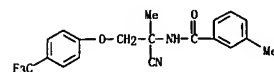
RN 247199-55-9 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-4-(trifluoromethyl)thio]- (CA INDEX NAME)



RN 247199-56-0 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-2-methyl- (CA INDEX NAME)

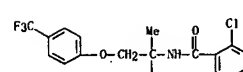


RN 247199-57-1 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-3-methyl- (CA INDEX NAME)

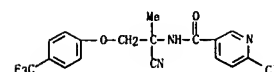


RN 247199-58-2 CAPLUS  
 CN Benzamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-4-methyl- (CA INDEX NAME)

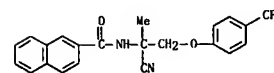
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



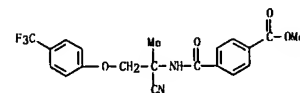
RN 247199-64-0 CAPLUS  
 CN 3-Pyridinecarboxamide, 6-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)



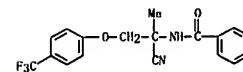
RN 247199-65-1 CAPLUS  
 CN 2-Naphthalenecarboxamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]- (CA INDEX NAME)



RN 247199-66-2 CAPLUS  
 CN Butoic acid, 4-[[[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]amino]carbonyl]-, methyl ester (CA INDEX NAME)

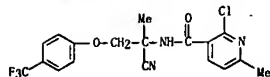


RN 247199-67-3 CAPLUS  
 CN 3-Pyridinecarboxamide, N-[(1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl)-1]- (CA INDEX NAME)

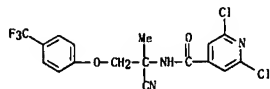


RN 247199-68-4 CAPLUS  
 CN 3-Pyridinecarboxamide, 2-chloro-N-[2-(4-chlorophenoxy)-1-cyano-1-methylethyl]- (CA INDEX NAME)

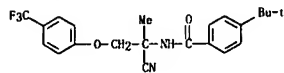
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



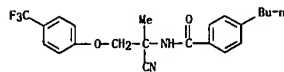
RN 247199-69-5 CAPLUS  
CN 4-Pyridinecarboxamide, 2,6-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



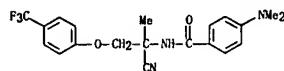
RN 247199-70-8 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(1,1-dimethylethyl)- (CA INDEX NAME)



RN 247199-71-9 CAPLUS  
CN Benzamide, 4-butyl-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

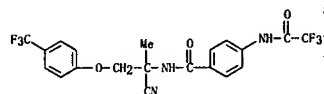


RN 247199-72-0 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(dimethylamino)- (CA INDEX NAME)

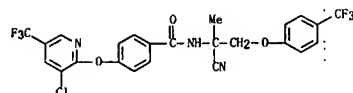


RN 247199-73-1 CAPLUS  
CN Benzamide, 4-cyano-N-[1-cyano-2,2-dimethyl-1-[[4-

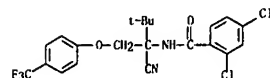
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



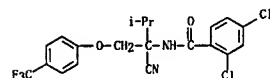
RN 247199-78-6 CAPLUS  
CN Benzamide, 4-[[3-chloro-5-(trifluoromethyl)-2-pyridinyloxy]-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



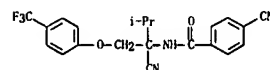
RN 247199-79-7 CAPLUS  
CN Benzamide, 2,4-dichloro-N-[1-cyano-2,2-dimethyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)



RN 247199-80-0 CAPLUS  
CN Benzamide, 2,4-dichloro-N-[1-cyano-2-methyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

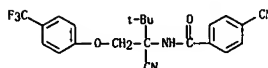


RN 247199-81-1 CAPLUS  
CN Benzamide, 4-cyano-N-[1-cyano-2-methyl-1-[[4-(trifluoromethyl)phenoxy]methyl]propyl]- (CA INDEX NAME)

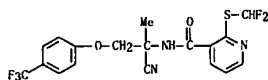


RN 247199-85-5 CAPLUS  
CN 2-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-

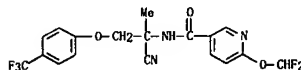
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



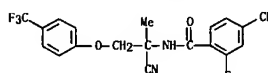
RN 247199-74-2 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-[(difluoromethyl)thio]- (CA INDEX NAME)



RN 247199-75-3 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-6-(difluoromethoxy)- (CA INDEX NAME)

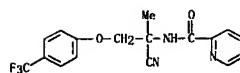


RN 247199-76-4 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-fluoro-4-(trifluoromethyl)- (CA INDEX NAME)

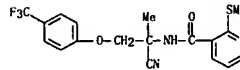


RN 247199-77-5 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(trifluoroacetyl)amino]- (9CI) (CA INDEX NAME)

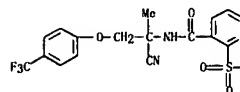
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



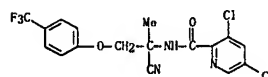
RN 247199-86-6 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(methylthio)- (CA INDEX NAME)



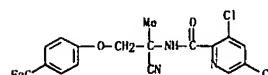
RN 247199-87-7 CAPLUS  
CN 3-Pyridinecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-2-(methylsulfonyl)- (CA INDEX NAME)



RN 247199-88-8 CAPLUS  
CN 2-Pyridinecarboxamide, 3,5-dichloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



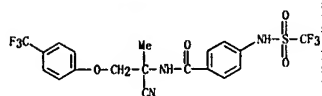
RN 247199-89-9 CAPLUS  
CN 2-Pyridinecarboxamide, 3-chloro-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-5-(trifluoromethyl)- (CA INDEX NAME)



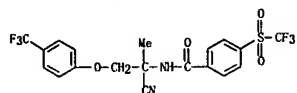
RN 247199-90-2 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-



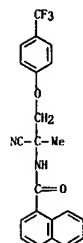
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
[[trifluoromethyl)sulfonyl]amino]- (CA INDEX NAME)



RN 247199-92-4 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(trifluoromethyl)sulfonyl]- (CA INDEX NAME)

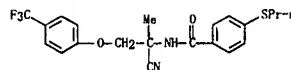


RN 247199-93-5 CAPLUS  
CN 1-Naphthalenecarboxamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)

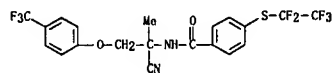


RN 247199-94-6 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-(propylthio)- (CA INDEX NAME)

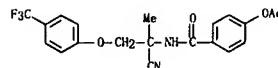
L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 247199-95-7 CAPLUS  
CN Benzamide, N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]-4-[(pentafluoroethylthio)- (9CI) (CA INDEX NAME)

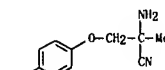


RN 247201-37-2 CAPLUS  
CN Benzamide, 4-(acetyloxy)-N-[1-cyano-1-methyl-2-[4-(trifluoromethyl)phenoxy]ethyl]- (CA INDEX NAME)



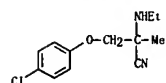
IT 247199-97-9P 247199-98-0P  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(preparation of aroylaminonitriles as agricultural and horticultural insecticides)

RN 247199-97-9 CAPLUS  
CN Propanenitrile, 2-amino-3-(4-chlorophenoxy)-2-methyl- (CA INDEX NAME)



RN 247199-98-0 CAPLUS  
CN Propanenitrile, 3-(4-chlorophenoxy)-2-(ethylamino)-2-methyl- (CA INDEX NAME)

L4 ANSWER 46 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 47 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

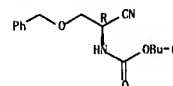
ACCESSION NUMBER: 1999:559542 CAPLUS  
DOCUMENT NUMBER: 131:257869  
TITLE: Solid-phase synthesis of oligourea peptidomimetics  
AUTHOR(S): Boeijen, Astrid; Liskamp, Rob M. J.  
CORPORATE SOURCE: Dep. Medicinal Chemistry, Utrecht Institute  
Pharmaceutical Sciences, Utrecht Univ., Utrecht, 3508  
TB, Neth.  
SOURCE: European Journal of Organic Chemistry (1999), (9),  
2127-2135  
CODEN: EJOCFK; ISSN: 1434-193X  
PUBLISHER: Wiley-VCH Verlag GmbH  
DOCUMENT TYPE: Journal  
LANGUAGE: English  
OTHER SOURCE(S): CASREACT 131:257869

ABSTRACT:  
A procedure for the solid-phase synthesis of oligourea peptidomimetics starting from Boc-protected monomers is described. The compds. are prepared on Tentagel resin and are obtained selectively either as the C-terminal free acids with UV irradiation using a photocleavable linker or as C-terminal hydantoins with 10% TEA/MeOH and a catalytic amount of KCN.

IT 244778-26-5P  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
(solid-phase synthesis of oligourea peptidomimetics)

RN 244778-26-5 CAPLUS  
CN Carbamic acid, [(1R)-1-cyano-2-(phenylmethoxy)ethyl]-, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (-).



REFERENCE COUNT: 32 THERE ARE 32 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1999-325961 CAPLUS

DOCUMENT NUMBER: 130-352553

TITLE:

INVENTOR(S):

Synthesis of dipeptide nitriles as inhibitors of  
cysteine cathepsins  
Altmann, Eva; Betaschart, Claudia; Gohde, Keigo;  
Horiuchi, Miyuki; Laitmann, Rene; Missbach, Martin;  
Sakaki, Junichi; Takai, Michihito; Teno, Naoki; Cowen,  
Scott Douglas; Greenspan, Paul David; McGuire, Leslie  
Wighton; Tommasi, Ruben Alberto; Van Duzer, John Henry

PATENT ASSIGNEE(S):

Novartis AG, Switz.; Novartis-Erfindungen

Verwaltungsgesellschaft mbH

PCT Int. Appl., 137 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9924460	A2	19990520	WO 1998-EP6937	19981103
WO 9924460	A3	19990902		
W:	AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW			
RW:	GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, CA, GN, GW, ML, MR, NE, SN, TD, TG			
CA 2306313	A1	19990531	CA 1998-2306313	19981103
AU 9914873	A2	19990531	AU 1999-14873	19981103
AU 751669	B2	20020822		
EP 1028942	A2	20000823	EP 1998-958887	19981103
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI			
BR 9813197	A	20000829	BR 1998-13197	19981103
TR 200001189	T2	20000921	TR 2000-1189	19981103
JP 2001522862	T	20011120	JP 2000-520468	19981103
HU 2000004400	A2	20020429	HU 2000-4400	19981103
RU 2201420	C2	20030327	RU 2000-114821	19981103
ZA 9810073	B	19990505	ZA 1998-10073	19981104
TW 527362	B	20030411	TW 1998-87118553	19981105
NO 2000002320	A	20000704	NO 2000-2320	20000502
MX 2000PA04375	A	20001211	MX 2000-PA4375	20000504
US 6353017	B1	20020305	US 2000-643639	20000822
US 2004029814	A1	20040212	US 2003-342872	20030115
US 2004110806	A1	20040610	US 2003-694672	20031028
US 2006232220	A1	20061019	US 2006-734995	20060315
PRIORITY APPL. INFO.:				
			GB 1997-23407	A 19971105
			US 1997-108160P	P 19971205
			US 1997-985973	A 19971205
			WO 1998-EP6937	W 19981103
			US 1998-186223	B1 19981104
			US 2000-643639	A1 20000822
			US 2002-54590	B1 20020122
			US 2003-342872	A1 20030115
			US 2003-694672	R1 20031028

OTHER SOURCE(S):

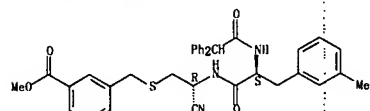
MARPAT 130:352553

ABSTRACT:

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

RN 225121-10-8 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethyl]thio]methyl]-, methyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



IT	225118-76-3P	225118-80-0P	225118-81-0P
	225118-92-3P	225119-39-1P	225119-40-4P
	225119-41-5P	225119-42-6P	225119-61-0P
	225119-62-0P	225120-41-2P	225121-06-2P
	225121-07-3P	225121-11-0P	225121-14-2P
	225121-15-3P	225121-16-4P	225121-17-5P
	225121-18-6P	225121-19-7P	225121-20-0P
	225121-21-1P	225121-22-2P	225121-23-3P
	225121-24-4P	225121-25-5P	225121-26-6P
	225121-27-7P	225121-29-9P	225121-30-2P
	225121-31-3P	225121-32-4P	225121-33-5P
	225121-34-6P	225121-35-7P	225121-36-8P
	225121-37-9P	225121-38-0P	225121-39-1P
	225121-40-4P	225121-41-5P	225121-42-6P
	225121-43-7P	225121-44-8P	225121-45-9P
	225121-46-0P	225121-47-1P	225121-48-2P
	225121-49-3P	225121-50-6P	225121-51-7P
	225121-52-8P	225121-53-9P	225121-54-0P
	225121-55-1P	225121-56-2P	225121-57-3P
	225121-58-4P	225121-59-5P	225121-60-8P
	225121-61-9P	225121-62-0P	225121-63-1P
	225121-64-2P	225121-65-3P	225121-66-4P
	225121-67-5P	225121-68-6P	225121-69-7P
	225121-70-0P	225121-71-1P	225121-72-2P
	225121-73-3P	225121-74-4P	225121-75-5P
	225121-77-7P	225121-78-8P	225121-79-9P
	225121-80-2P	225121-81-3P	225121-82-4P
	225121-83-5P	225121-84-6P	225121-85-7P
	225121-86-8P	225121-87-9P	225121-89-1P
	225121-92-6P	225121-93-7P	225121-94-8P
	225121-95-9P	225121-96-0P	225121-97-1P
	225121-98-2P	225121-99-3P	225122-00-9P
	225122-01-0P	225122-02-1P	225122-03-2P
	225122-04-3P	225122-05-4P	225122-06-5P
	225122-07-6P	225122-08-7P	225122-09-8P
	225122-10-1P	225122-11-2P	225122-12-3P
	225122-13-4P	225122-14-5P	225122-15-6P
	225122-16-7P	225122-17-8P	225122-18-9P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); B10L (Biological study); PREP (Preparation); USES (Uses)  
(synthesis of dipeptide nitriles as inhibitors of cysteine cathepsins)

RN 225118-76-3 CAPLUS

CN Carbamic acid, 1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl]-, phenylmethyl ester (9C1) (CA INDEX NAME)

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

N-terminal substituted dipeptide nitriles R(L)x1NHC(R2R3C)(Y)NHC(R4R5)N [R is optionally substituted aryl, alkyl, alkenyl, alkynyl, heterocyclyl; R2, R3 = H, optionally substituted alkyl, cycloalkyl, bicycloalkyl, or aryl-, biaryl-, cycloalkyl, bicycloalkylalkyl; R2 and R3 together represent alkylene, optionally interrupted by O, S, or NR6, where R6 is H, alkyl, arylalkyl; or R2 or R3 are linked by alkylene to the adjacent nitrogen to form a ring; R4, R5 = H, optionally substituted alkyl, arylalkyl, CO2R7, CONR7R8 (R7 is optionally substituted alkyl, aryl, arylalkyl, cycloalkyl, bicycloalkyl, or heterocyclyl and R8 is H or optionally substituted alkyl, aryl, arylalkyl, cycloalkyl, bicycloalkyl, heterocyclyl), etc.; R4 and R5 together represent alkylene, optionally interrupted by O, S, or NR6; X1 = CO, CS, SO, SO2, P(O)OR6; Y = O, S; L is optionally substituted Het, Het-CO2, CO2-Het (Het = O, N, or S); x = zero or 1] were prepd. as inhibitors of cysteine cathepsins, e.g., cathepsins B, K, L and S, and can be used for the treatment of cysteine cathepsin dependent diseases and conditions. Thus, N-2-[(3-carboxyphenyl)methoxy]-1(S)-cyanoethyl]-3-methyl-Nu-(2,2-diphenylacetyl)-L-phenylalaninamide was prepd. and shown to have IC50 = 5 nM for inhibition of cathepsin B.

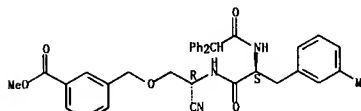
IT 225121-05-1P 225121-08-4P 225121-10-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); RCT (Reactant); SPN (Synthetic preparation); THU (Therapeutic use); B10L (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)  
(synthesis of dipeptide nitriles as inhibitors of cysteine cathepsins)

RN 225121-05-1 CAPLUS

CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]-, methyl ester (9C1) (CA INDEX NAME)

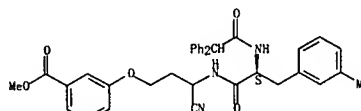
Absolute stereochemistry.



RN 225121-08-4 CAPLUS

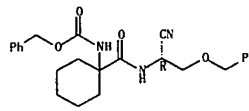
CN Benzoic acid, 3-[3-cyano-3-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]propoxy]-, methyl ester (9C1) (CA INDEX NAME)

Absolute stereochemistry.



L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

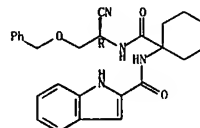
Absolute stereochemistry.



RN 225118-80-9 CAPLUS

CN 1H-Indole-2-carboxamide, N-[1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl]- (CA INDEX NAME)

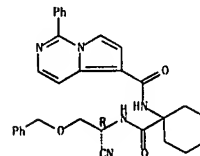
Absolute stereochemistry.



RN 225118-81-0 CAPLUS

CN Pyrrol[1,2-c]pyrimidine-5-carboxamide, N-[1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]cyclohexyl]-1-phenyl- (CA INDEX NAME)

Absolute stereochemistry.

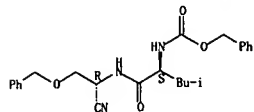


RN 225118-92-3 CAPLUS

CN Carbamic acid, 1-[[[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-, phenylmethyl ester (9C1) (CA INDEX NAME)

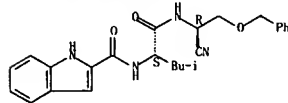
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



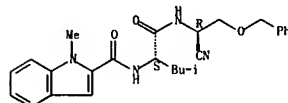
RN 225119-39-1 CAPLUS  
CN 1H-Indole-2-carboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



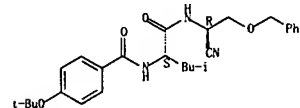
RN 225119-40-4 CAPLUS  
CN 1H-Indole-3-acetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-1-methyl- (9C1) (CA INDEX NAME)

Absolute stereochemistry.

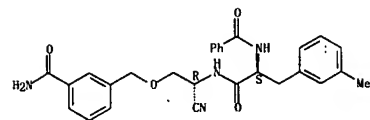


RN 225119-41-5 CAPLUS  
CN Benzamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]-4-(1,1-dimethylethoxy)- (CA INDEX NAME)

Absolute stereochemistry.

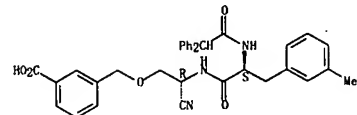


L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



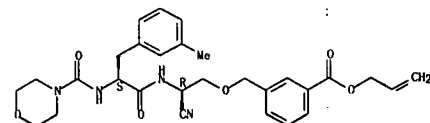
RN 225121-06-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-07-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



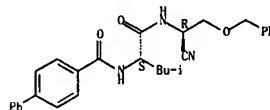
RN 225121-11-9 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

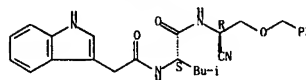
RN 225119-42-6 CAPLUS  
CN [1,1'-Biphenyl]-4-carboxamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



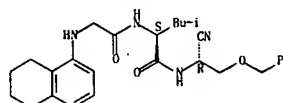
RN 225119-61-9 CAPLUS  
CN 1H-Indole-3-acetamide, N-[(1S)-1-[[[(1R)-1-cyano-2-(phenylmethoxy)ethyl]amino]carbonyl]-3-methylbutyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225119-62-0 CAPLUS  
CN L-Leucinamide, N-(5,6,7,8-tetrahydro-1-naphthalenyl)glycyl-N-[(1R)-1-cyano-2-(phenylmethoxy)ethyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.

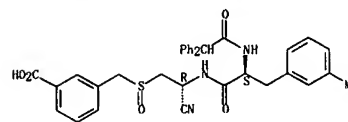


RN 225120-41-2 CAPLUS  
CN Benzenepropanamide, N-[(1R)-2-[[3-(aminocarbonyl)phenyl]methoxy]-1-cyanoethyl]-α-(benzoylamino)-3-methyl-, (αS)- (CA INDEX NAME)

Absolute stereochemistry.

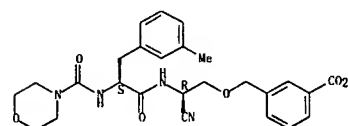


L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



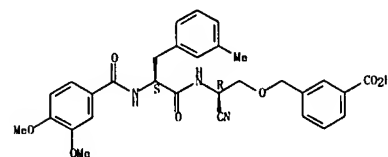
RN 225121-14-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(diphenylacetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-15-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[3-(4-dimethoxybenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

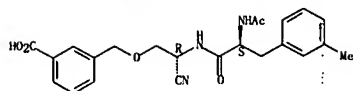
Absolute stereochemistry.



RN 225121-16-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(acetyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (9C1) (CA INDEX NAME)

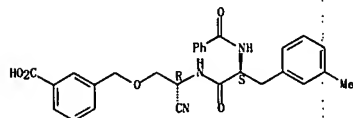
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



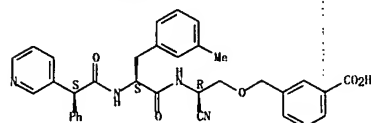
RN 225121-17-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[(2S)-2-(benzoylamino)-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-18-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(2S)-phenyl-3-pyridinylacetyl]amino]propyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

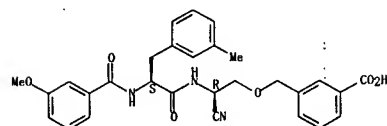
Absolute stereochemistry.



RN 225121-19-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(2S)-phenyl-3-pyridinylacetyl]amino]propyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

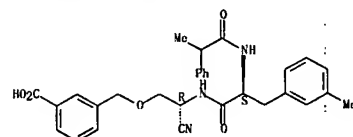
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



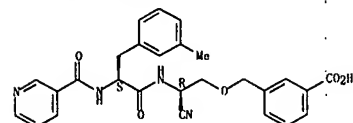
RN 225121-23-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(2R)-2-phenylpropyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-24-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(2R)-2-phenylpropyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

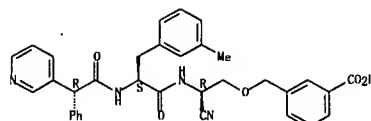
Absolute stereochemistry.



RN 225121-25-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(2R)-2-phenylpropyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

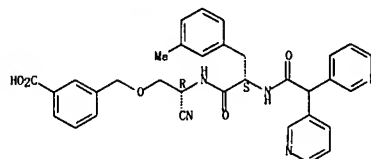
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



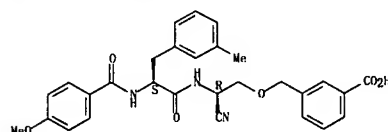
RN 225121-20-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[(di-3-pyridinylacetyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-21-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[(4-methoxybenzoyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

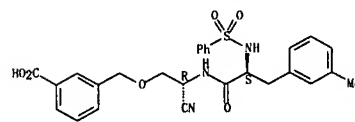
Absolute stereochemistry.



RN 225121-22-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[(4-methoxybenzoyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

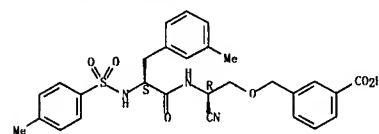
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



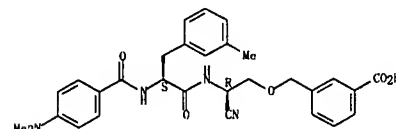
RN 225121-26-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[[[(4-methylphenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-27-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[[[(4-methylphenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



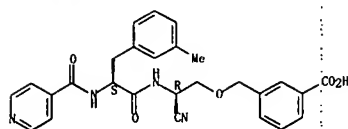
RN 225121-29-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[[[(4-pyridinylcarbonyl]amino]propyl]amino]ethoxy]methyl]-, mono(trifluoroacetate) (9C1) (CA INDEX NAME)

CM 1

CRN 225121-28-8  
 CMF C27 H26 N4 O5

Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

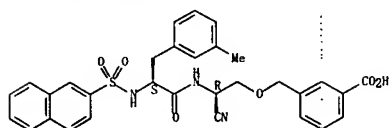


CM 2  
CRN 76-05-1  
CMF C2 H F3 O2



RN 225121-30-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-2-[(2-naphthalenylsulfonyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

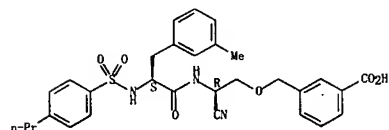
Absolute stereochemistry.



RN 225121-31-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[(4-bromophenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

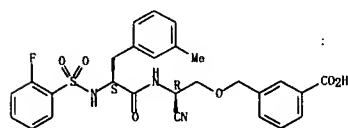
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



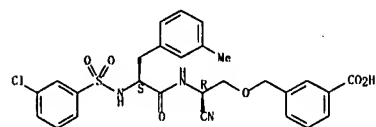
RN 225121-35-7 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(2-fluorophenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-36-8 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[(2S)-2-[(3-chlorophenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

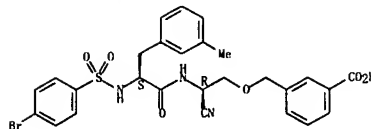
Absolute stereochemistry.



RN 225121-37-9 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(3-fluorophenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

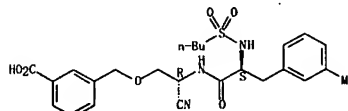
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



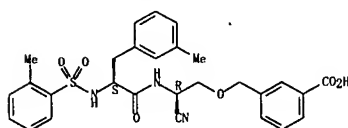
RN 225121-32-4 CAPLUS  
CN Benzoic acid, 3-[(4R,7S)-4-cyano-7-[(3-methylphenyl)methyl]-9,9-dioxido-6-oxo-2-oxa-9-thia-5,8-diazatridec-1-yl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-33-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-2-[(2-methylphenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

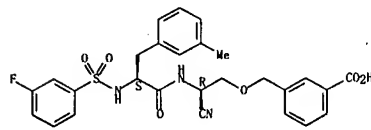
Absolute stereochemistry.



RN 225121-34-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-[(4-propylphenyl)sulfonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

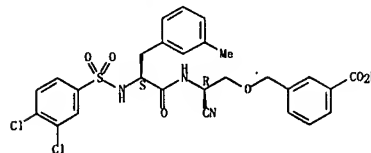
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



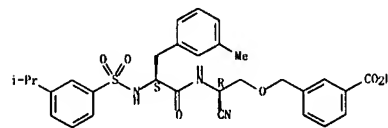
RN 225121-38-0 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(3,4-dichlorophenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-39-1 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-2-[(3-(1-methylethyl)phenyl)sulfonyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

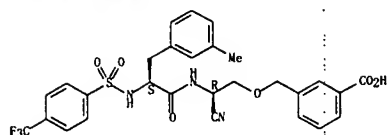
Absolute stereochemistry.



RN 225121-40-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-1-oxo-2-[(4-(trifluoromethyl)phenyl)sulfonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

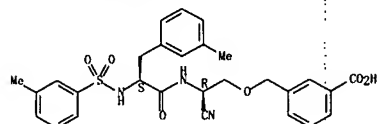
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



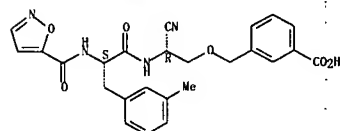
RN 225121-41-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[[[(3-methylphenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-42-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(5-isoxazolylcarbonyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

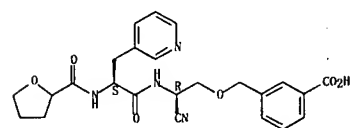
Absolute stereochemistry.



RN 225121-43-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

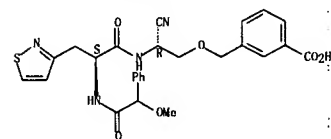
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



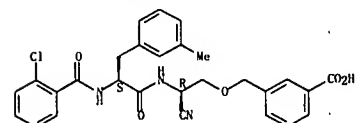
RN 225121-47-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-48-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

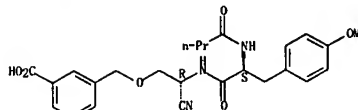
Absolute stereochemistry.



RN 225121-49-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

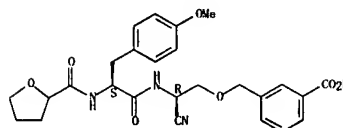
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



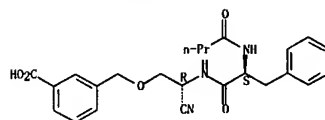
RN 225121-44-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-45-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

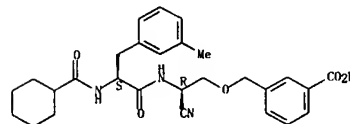
Absolute stereochemistry.



RN 225121-46-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

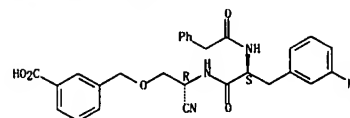
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



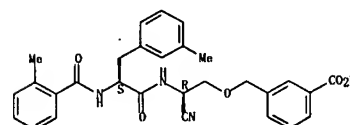
RN 225121-50-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



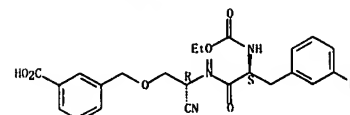
RN 225121-51-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-52-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-1-oxo-2-[[[(tetrahydro-2-furanyl)carbonyl]amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

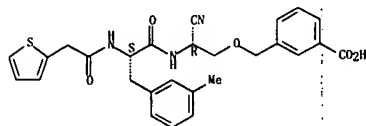
Absolute stereochemistry.



L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

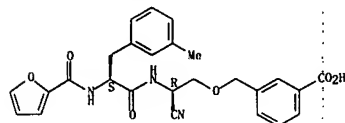
RN 225121-53-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[(2-thienylacetyl)amino]propyl]amino]ethoxy]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



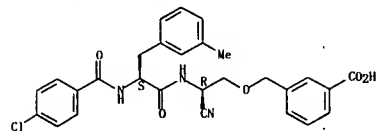
RN 225121-54-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2-furanylcarbonyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



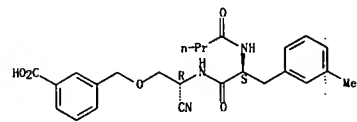
RN 225121-55-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



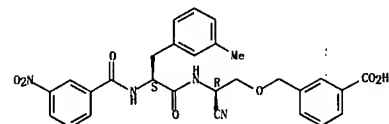
RN 225121-56-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[3,5-bis(trifluoromethyl)benzoyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



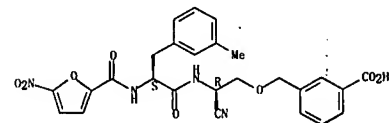
RN 225121-60-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[(3-nitrobenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-61-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-2-[[[(5-nitro-2-furanyl)carbonyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

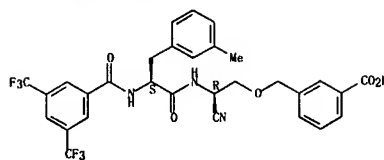


RN 225121-62-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-bromobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

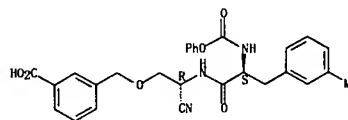
L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



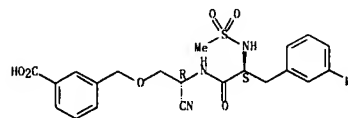
RN 225121-57-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[(phenoxyacetyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-58-4 CAPLUS  
 CN Benzoic acid, 3-[[[(4R,7S)-4-cyano-7-[[3-methylphenyl]methyl]-9,9-dioxido-6-oxo-2-oxa-9-thia-5,8-diazadec-1-yl]- (CA INDEX NAME)

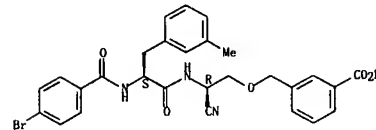
Absolute stereochemistry.



RN 225121-59-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

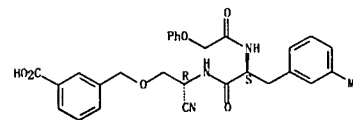
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



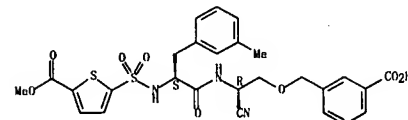
RN 225121-63-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3-methylphenyl)-1-oxo-2-[(phenoxyacetyl)amino]propyl]amino]ethoxy]methyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-64-2 CAPLUS  
 CN 2-Thiophenecarboxylic acid, 5-[[[[[(1S)-2-[[[(1R)-2-[(3-carboxyphenyl)methoxy]-1-cyanoethyl]amino]-1-[(3-methylphenyl)methyl]-2-oxoethyl]amino]sulfonyl]-, 2-methyl ester (CA INDEX NAME)

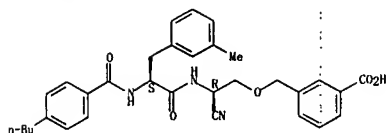
Absolute stereochemistry.



RN 225121-65-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-butylbenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

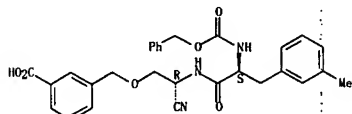
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



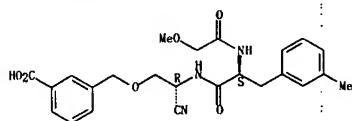
RN 225121-66-4 CAPLUS  
 CN Benzoic acid, 3-[(4R,7S)-4-cyano-7-[(3-methylphenyl)methyl]-6,9-dioxo-11-phenyl-2,10-dioxo-5,8-diazadec-1-yl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-67-5 CAPLUS  
 CN Benzoic acid, 3-[(4R,7S)-4-cyano-7-[(3-methylphenyl)methyl]-6,9-dioxo-2,11-dioxo-5,8-diazadec-1-yl]- (CA INDEX NAME)

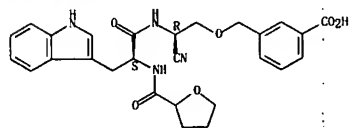
Absolute stereochemistry.



RN 225121-68-6 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-2-[(1-naphthalenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxymethyl]- (CA INDEX NAME)

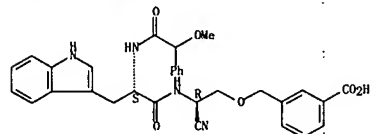
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



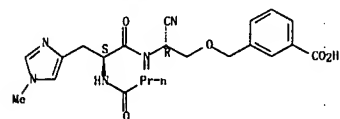
RN 225121-72-2 CAPLUS  
 CN Benzoic acid, 3-[(4R,7S)-4-cyano-7-[(1H-indol-3-yl)methyl]-6,9-dioxo-10-phenyl-2,11-dioxo-5,8-diazadec-1-yl]- (CA INDEX NAME)

Absolute stereochemistry.



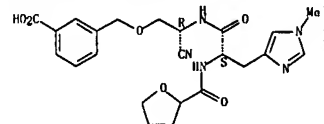
RN 225121-73-3 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(1-methyl-1H-imidazol-4-yl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxymethyl]- (CA INDEX NAME)

Absolute stereochemistry.

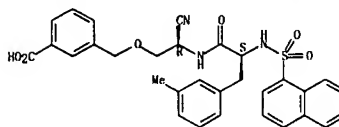


RN 225121-74-4 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(1-methyl-1H-imidazol-4-yl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxymethyl]- (CA INDEX NAME)

Absolute stereochemistry.

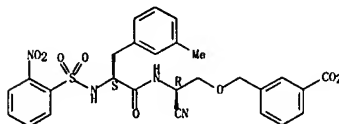


L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



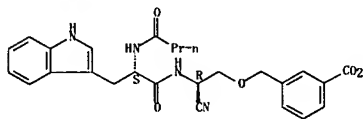
RN 225121-69-7 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(3-methylphenyl)-2-[(2-nitrophenyl)sulfonyl]amino]-1-oxopropyl]amino]ethoxymethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-70-0 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(1H-indol-3-yl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxymethyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-71-1 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-3-(1H-indol-3-yl)-1-oxo-2-[(1-oxobutyl)amino]propyl]amino]ethoxymethyl]- (CA INDEX NAME)

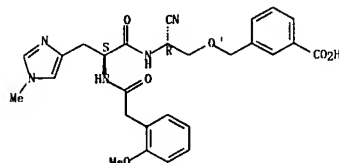
Absolute stereochemistry.



L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

RN 225121-75-5 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-2-[(2-methoxyphenyl)acetyl]amino]-3-(1-methyl-1H-imidazol-4-yl)-1-oxopropyl]amino]ethoxymethyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

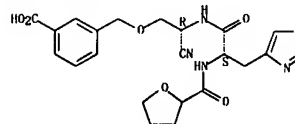


RN 225121-77-7 CAPLUS  
 CN Benzoic acid, 3-[(2R)-2-cyano-2-[(2S)-1-oxo-2-[(1-tetrahydro-2-furanyl)carbonyl]amino]-3-(4-thiazolyl)propyl]amino]ethoxymethyl]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 225121-76-6  
 CMF C22 H24 N4 O6 S

Absolute stereochemistry.



CM 2

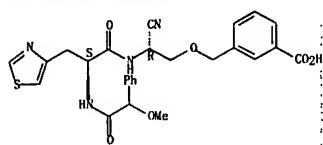
CRN 76-05-1  
 CMF C2 H F3 O2



RN 225121-78-8 CAPLUS  
 CN Benzoic acid, 3-[(4R,7S)-4-cyano-6,9-dioxo-10-phenyl-7-(4-thiazolyl)methyl]-2,11-dioxo-5,8-diazadec-1-yl]- (CA INDEX NAME)

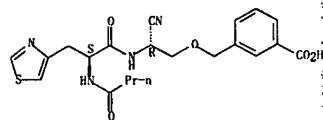


L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
Absolute stereochemistry.



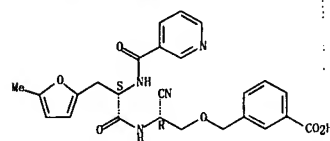
RN 225121-79-9 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-1-oxo-2-[(1-oxobutyl)amino]-3-(4-thiazolyl)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-80-2 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(5-methyl-2-furanyl)-1-oxo-2-[(3-pyridinylcarbonyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

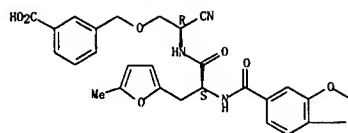
Absolute stereochemistry.



RN 225121-81-3 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[[1,3-benzodioxol-5-ylcarbonyl]amino]-3-(5-methyl-2-furanyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

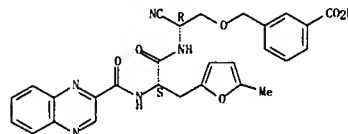
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



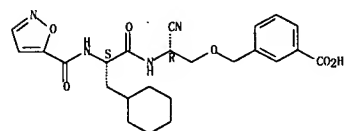
RN 225121-82-4 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(5-methyl-2-furanyl)-1-oxo-2-[(2-quinoxalinylylcarbonyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-83-5 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-cyclohexyl-2-[(5-isoxazolylcarbonyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

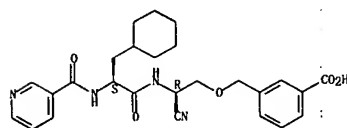
Absolute stereochemistry.



RN 225121-84-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-cyclohexyl-1-oxo-2-[(3-pyridinylcarbonyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

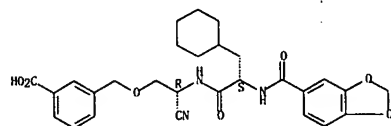
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



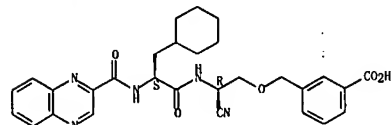
RN 225121-85-7 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[[1,3-benzodioxol-5-ylcarbonyl]amino]-3-(5-methyl-2-furanyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-86-8 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-cyclohexyl-1-oxo-2-[(2-quinoxalinylylcarbonyl)amino]propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

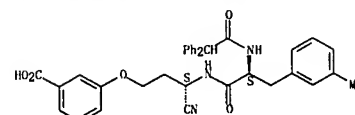
Absolute stereochemistry.



RN 225121-87-9 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[diphenylacetyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

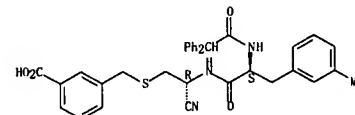
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



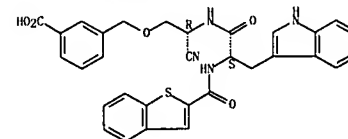
RN 225121-89-1 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[[[diphenylacetyl]amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



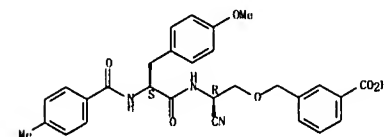
RN 225121-92-6 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[[[benzo[b]thien-2-ylcarbonyl]amino]-3-(1H-indol-3-yl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-93-7 CAPLUS  
CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(4-methoxyphenyl)-2-[(4-methylbenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

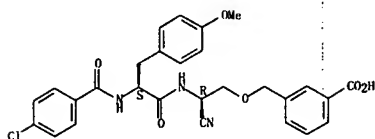
Absolute stereochemistry.



L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

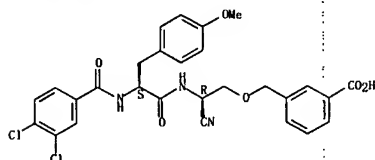
RN 225121-94-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-(4-methoxyphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



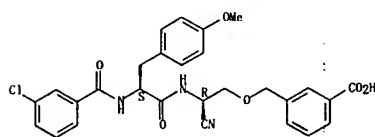
RN 225121-95-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-3-(4-methoxyphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225121-96-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(3-chlorobenzoyl)amino]-3-(4-methoxyphenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

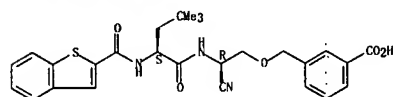


RN 225121-97-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-cyclohexyl-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

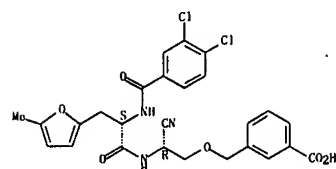
RN 225122-01-0 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(benzo[b]thien-2-ylcarbonyl)amino]-4,4-dimethyl-1-oxopentyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-02-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-3-(5-methyl-2-furanyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

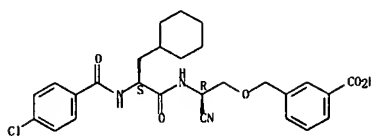


RN 225122-03-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-cyclohexyl-2-[(4-methylbenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

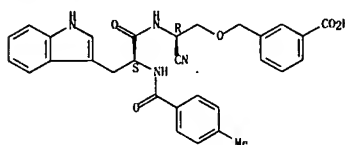
L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



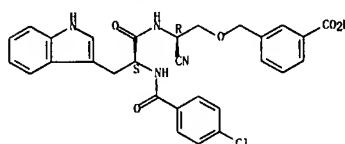
RN 225121-98-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(1H-indol-3-yl)-2-[(4-methylbenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



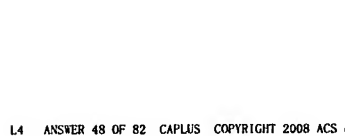
RN 225121-99-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-(1H-indol-3-yl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-00-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-3-(1H-indol-3-yl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

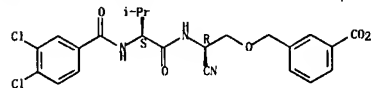
Absolute stereochemistry.



L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

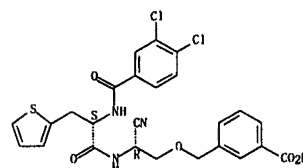
RN 225122-04-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-3-methyl-1-oxobutyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-05-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-1-oxo-3-(2-thienyl)propyl]amino]ethoxy]methyl]- (CA INDEX NAME)

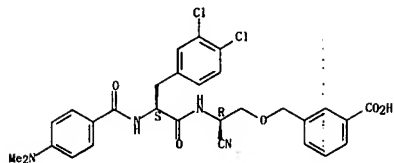
Absolute stereochemistry.



RN 225122-06-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3,4-dichlorophenyl)-2-[[4-(dimethylamino)benzoyl]amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

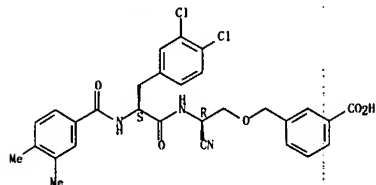
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



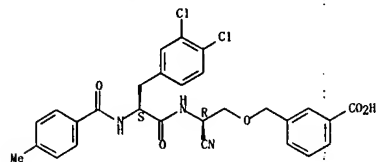
RN 225122-07-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3,4-dichlorophenyl)-2-[(3,4-dimethylbenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-08-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-3-(3,4-dichlorophenyl)-2-[(4-methylbenzoyl)amino]-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

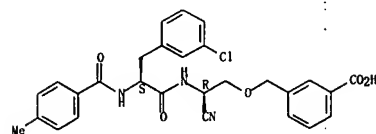
Absolute stereochemistry.



RN 225122-09-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-(3,4-dichlorophenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

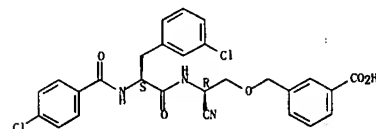
L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



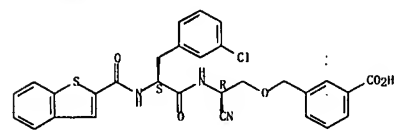
RN 225122-13-4 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-chlorobenzoyl)amino]-3-(3-chlorophenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-14-5 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(benzo[b]thien-2-ylcarbonyl)amino]-3-(3-chlorophenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

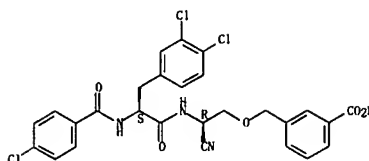


RN 225122-15-6 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-3-(3-chlorophenyl)-2-[(3,4-dichlorobenzoyl)amino]-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.

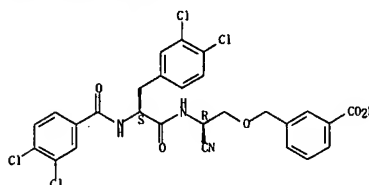
L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Absolute stereochemistry.



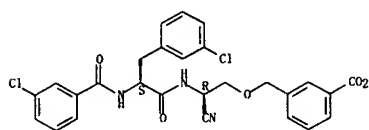
RN 225122-10-1 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(3,4-dichlorobenzoyl)amino]-3-(3,4-dichlorophenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



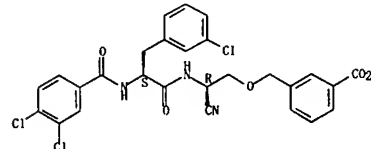
RN 225122-11-2 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(3-chlorobenzoyl)amino]-3-(3-chlorophenyl)-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



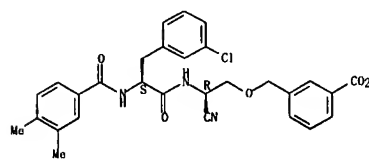
RN 225122-12-3 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-3-(3-chlorophenyl)-2-[(4-methylbenzoyl)amino]-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



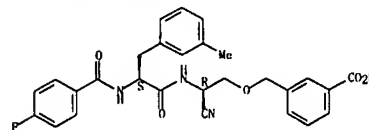
RN 225122-16-7 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-3-(3-chlorophenyl)-2-[(3,4-dimethylbenzoyl)amino]-1-oxopropyl]amino]-2-cyanoethoxy]methyl]- (CA INDEX NAME)

Absolute stereochemistry.



RN 225122-17-8 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-[[[(2S)-2-[(4-fluorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

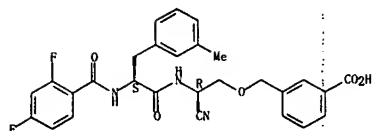
Absolute stereochemistry.



RN 225122-18-9 CAPLUS  
 CN Benzoic acid, 3-[[[(2R)-2-cyano-2-[[[(2S)-2-[(2,4-difluorobenzoyl)amino]-3-(3-methylphenyl)-1-oxopropyl]amino]ethoxy]methyl]- (CA INDEX NAME)

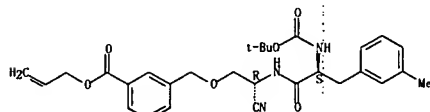
Absolute stereochemistry.

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



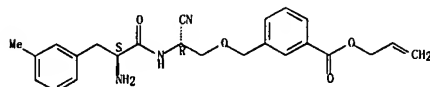
IT 225122-60-1P 225122-61-2P 225122-64-5P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT  
 (Reactant or reagent)  
 (synthesis of dipeptide nitriles as inhibitors of cysteine cathepsins)  
 RN 225122-60-1 CAPLUS  
 CN Benzoic acid, 3-[[4(R,7S)-4-cyano-11,11-dimethyl-7-[(3-methylphenyl)methyl]-  
 6,9-dioxo-2,10-dioxo-5,8-diazadodec-1-yl]]-, 2-propenyl ester (9C1) (CA  
 INDEX NAME)

Absolute stereochemistry.



RN 225122-61-2 CAPLUS  
 CN Benzoic acid, 3-[[4(R,7S)-4-cyano-11,11-dimethyl-7-[(3-methylphenyl)methyl]-  
 oxopropyl]amino]-2-cyanoethoxymethyl]-, 2-propenyl ester (9C1) (CA INDEX  
 NAME)

Absolute stereochemistry.



RN 225122-64-5 CAPLUS  
 CN Benzoic acid, 3-(3-amino-3-cyanopropoxy)-, methyl ester (CA INDEX NAME)

L4 ANSWER 49 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1996:569059 CAPLUS  
 DOCUMENT NUMBER: 125:301511  
 TITLE: Enantiomerically pure  $\alpha$ -fluoroalkyl- $\alpha$ -  
 amino acids: synthesis of (R)- $\alpha$ -  
 difluoromethylalanine and (S)- $\alpha$ -  
 difluoromethylserine

AUTHOR(S): Bravo, Pierfrancesco; Capelli, Silvia; Meille, Stefano  
 V.; Seresini, Paolo; Volonteri, Alessandro; Zanda,  
 Matteo

CORPORATE SOURCE: C.N.R., Dip. Chimia Politecnico Milano, Centro Studio  
 Sostanze Organiche Naturali, Milan, I-20131, Italy

SOURCE: Tetrahedron: Asymmetry (1996), 7(8), 2321-2332  
 CODEN: TASYE3; ISSN: 0957-4166

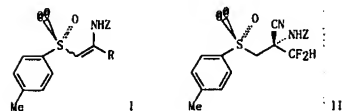
PUBLISHER: Elsevier

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 125:301511

GRAPHIC IMAGE:

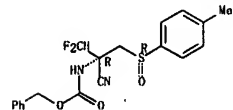


ABSTRACT:  
 Hydrocyanation of enantiomerically pure N-Cbz  $\alpha$ -fluoroalkyl  
 P-sulfinylamines (I: R = CF<sub>3</sub>, CF<sub>2</sub>H, CF<sub>2</sub>Cl) occurs smoothly by treatment  
 with KCN or by addition of Me<sub>3</sub>SiCN or (EtO)<sub>2</sub>P(O)CN to preformed sodium derivs. of  
 I. The diastereoisomeric difluoro- $\alpha$ -amino nitriles (II) have been  
 converted to the unnatural amino acids (R)- $\alpha$ -difluoromethylalanine and  
 (S)- $\alpha$ -difluoromethylserine.

IT 182998-18-1P 183075-51-6P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT  
 (Reactant or reagent)  
 (synthesis of (R)- $\alpha$ -difluoromethylalanine and  
 (S)- $\alpha$ -difluoromethylserine)

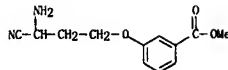
RN 182998-18-1 CAPLUS  
 CN Carbamic acid, [1-cyano-2,2-difluoro-1-[[4-(4-methylphenyl)sulfinyl]methyl]e  
 thyl]-, phenylmethyl ester, [R-(R\*,S\*)]- (9C1) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



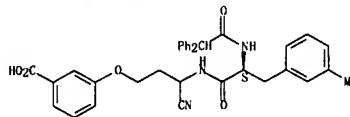
RN 183075-51-6 CAPLUS  
 CN Carbamic acid, [1-cyano-2,2-difluoro-1-[[4-(4-methylphenyl)sulfinyl]methyl]e  
 thyl]-, phenylmethyl ester, [R-(R\*,S\*)]- (9C1) (CA INDEX NAME)

L4 ANSWER 48 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



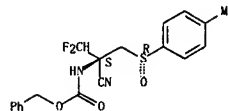
IT 225122-65-6P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (synthesis of dipeptide nitriles as inhibitors of cysteine cathepsins)  
 RN 225122-65-6 CAPLUS  
 CN Benzoic acid, 3-[3-cyano-3-[[2(S)-2-[(diphenylacetyl)amino]-3-(3-  
 methylphenyl)-1-oxopropyl]amino]propoxy]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



L4 ANSWER 49 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

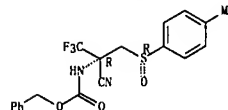
Absolute stereochemistry. Rotation (+).



IT 182998-08-9P 182998-29-4P 183075-50-5P  
 183075-52-7P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (synthesis of (R)- $\alpha$ -difluoromethylalanine and  
 (S)- $\alpha$ -difluoromethylserine)

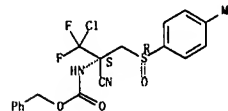
RN 182998-08-9 CAPLUS  
 CN Carbamic acid, [1-cyano-2,2,2-trifluoro-1-[[4-(4-  
 methylphenyl)sulfinyl]methyl]ethyl]-, phenylmethyl ester, [R-(R\*,R\*)]-  
 (9C1) (CA INDEX NAME)

Absolute stereochemistry.



RN 182998-29-4 CAPLUS  
 CN Carbamic acid, [2-chloro-1-cyano-2,2-difluoro-1-[[4-(4-  
 methylphenyl)sulfinyl]methyl]ethyl]-, phenylmethyl ester, [R-(R\*,S\*)]-  
 (9C1) (CA INDEX NAME)

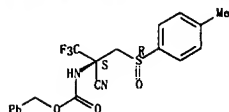
Absolute stereochemistry.



RN 183075-50-5 CAPLUS  
 CN Carbamic acid, [1-cyano-2,2,2-trifluoro-1-[[4-(4-  
 methylphenyl)sulfinyl]methyl]ethyl]-, phenylmethyl ester, [R-(R\*,S\*)]-  
 (9C1) (CA INDEX NAME)

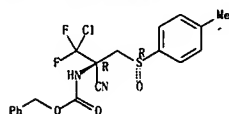
Absolute stereochemistry.

L4 ANSWER 49 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



RN 183075-52-7 CAPLUS  
 CN Carbanic acid, [2-chloro-1-cyano-2,2-difluoro-1-[[[4-methylphenyl]sulfinyl]methyl]ethyl]-, phenylmethyl ester, [R-(R\*,R\*)]-(9C1) (CA INDEX NAME)

Absolute stereochemistry.



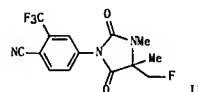
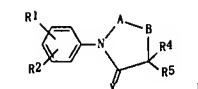
L4 ANSWER 50 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1995:951197 CAPLUS  
 DOCUMENT NUMBER: 123:340123  
 TITLE: Preparation of phenylimidazolidines as antiandrogenics  
 INVENTOR(S): Claussner, Andre; Goubet, Francois; Teutsch, Jean-Georges  
 PATENT ASSIGNEE(S): Roussel-UCLAF, Fr.  
 SOURCE: PCT Int. Appl., 96 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: French  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9518794	A1	19950713	WO 1995-FR4	19950104
W: AU, BR, CA, CN, FI, HU, JP, KR, RU, UA, US				
FR 2715402	A1	19950728	FR 1994-42	19940105
FR 2715402	B1	19961004		
FR 2724169	A1	19960308	FR 1994-10660	19940906
FR 2724169	B1	19970103		
TW 521073	B	20030221	TW 1994-83111272	19941205
IL 111908	A	20030529	IL 1994-111908	19941207
CA 2180319	A1	19950713	CA 1995-2180319	19950104
AU 9514573	A	19950801	AU 1995-14573	19950104
AU 687152	B2	19980219		
EP 738263	A1	19961023	EP 1995-906361	19950104
EP 738263	B1	20010404		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, MC, NL, PT, SE				
CN 1141631	A	19970129	CN 1995-191761	19950104
CN 1113873	B	20030709		
JP 09507241	T	19970722	JP 1995-518337	19950104
HU 76299	A2	19970728	HU 1996-1836	19950104
BR 9506457	A	19971007	BR 1995-6457	19950104
RU 2152934	C1	20000720	RU 1996-116993	19950104
AT 200281	T	20010415	AT 1995-906361	19950104
ES 2156204	T3	20010616	ES 1995-906361	19950104
PT 738263	T	20010830	PT 1995-906361	19950104
ZA 9500057	A	19960105	ZA 1995-57	19950105
US 5750553	A	19980512	US 1996-669419	19960627
FI 9602754	A	19960704	FI 1996-2754	19960704
FI 112475	B1	20031215		
GR 3035853	T3	20010831	GR 2001-400704	20010511
PRIORITY APPLN. INFO.:			FR 1994-42	A 19940105
			FR 1994-10660	A 19940906
			WO 1995-FR4	W 19950104

OTHER SOURCE(S): MARPAT 123:340123  
 GRAPHIC IMAGE:

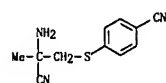
L4 ANSWER 50 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



ABSTRACT:  
 Title compds. [1: AB = C(X)NR3, C(SR):N; R = alk(en)yl, aryl(alkyl), etc.; R1, R2 = cyano, NO2, halo, CF3, etc.; R3 = H, groups cited for R; R4, R5 = H, (un)substituted alkyl, etc.; X = O or S; Y = O, S, NH] were prepared. Thus, 84% inhibition of ornithine decarboxylase prepared from castrated mice receiving testosterone propionate and 1.5mg/kg prepared title compound 11 s.c. was observed

IT 170860-96-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation of phenylimidazolidines as antiandrogenics)

RN 170860-96-5 CAPLUS  
 CN Benzonitrile, 4-[(2-amino-2-cyanopropyl)thio]- (CA INDEX NAME)



L4 ANSWER 51 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1995:763507 CAPLUS  
 DOCUMENT NUMBER: 123:170178  
 TITLE: Amino acid amide derivative, agrohorticultural bactericide, and production process  
 INVENTOR(S): Shibata, Masuru; Sugiyama, Kazuhiko; Yonekura, Norihisa; Sakai, Junetsu; Kojima, Yoshiyuki; Hayashi, Shigeru  
 PATENT ASSIGNEE(S): Kumiai Chemical Industry Co., Ltd., Japan; Ihara Chemical Industry Co., Ltd.  
 SOURCE: PCT Int. Appl., 134 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9425432	A1	19941110	WO 1994-JP708	19940427
W: BR, CN, PL, RO, RU, UA, US				
FR 2715402	A1	19950419	EP 1994-914561	19940427
EP 648740	B1	19971008		
EP 648740	B1	19971008		
R: BE, ES, FR, GB, IT, NL, PT				
CN 1108363	A	19950920	CN 1994-190249	19940427
CN 1078204	B	20020123		
RO 112859	B3	19980130	RO 1994-2120	19940427
RU 2128186	C1	19990327	RU 1994-46335	19940427
PL 175906	B1	19990331	PL 1994-306836	19940427
BR 9405281	A	19990831	BR 1994-5281	19940427
JP 07010825	A	19950113	JP 1994-114345	19940428
JP 3672944	B2	20050720		
CA 2180000	A1	19960509	CA 1994-2180000	19941027
CA 2180000	C	20000627		
US 574064	A	19961112	US 1994-356316	19941228
US 5723469	A	19980303	US 1996-678299	19960711
PRIORITY APPLN. INFO.:			JP 1993-125455	A 19930428
			WO 1994-JP708	W 19940427
			US 1994-356316	A3 19941228

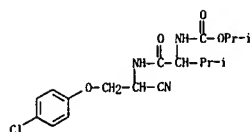
OTHER SOURCE(S): CASREACT 123:170178; MARPAT 123:170178

ABSTRACT:  
 Title compds. R1-Z1-C(22)NH-CH2-CO-NH-CR3R4-(CR5R6)-a-Z3-(CR7R8)n-Q [1: R1 = alkyl, alkenyl, alkynyl, etc.; R2 = Et, Pr, iso-Pr, iso-Bu, sec-Bu, tert-Bu, alkenyl, cycloalkyl, etc.; R3 = H, alkyl; R4 = H, alkyl, cyano; R5, R6, R7 = H, alkyl; R8 = H, alkyl, aralkyl, Ph, alkoxy, carbonyl, cyano; Z1, Z2 = H, S; Z3 = H, S, (un)substituted imino, etc.; a = 0-2 integer; n = 0, 1] are prepared. Thus, 1-methyl-2-(4-nitrophenoxy)ethylamine was added to a mixture of N-tert-butoxycarbonyl-L-valine, CH2Cl2, N-methylpiperidine, and iso-Bu chloroformate at -60° and the resulting mixture was allowed to react at room temperature for 15 h to give 55% N2-tert-butoxycarbonyl-N1-[1-methyl-2-(4-nitrophenoxy)ethyl]-L-valinamide. I have a high control effect on downy mildew of cucumber, diseases of tomato and downy mildew of grape. Further it is excellent in the capability of penetration and migration, residual effect and rainfall resistance without causing crop injury.

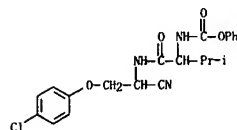
IT 167087-41-4P 167087-42-5P  
 RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (amino acid amide derivative, agrohorticultural bactericide, and production process)

RN 167087-41-4 CAPLUS  
 CN Carbanic acid, [1-[[[2-(4-chlorophenoxy)-1-cyanoethyl]amino]carbonyl]-2-methylpropyl]-, 1-methylethyl ester (9C1) (CA INDEX NAME)

L4 ANSWER 51 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

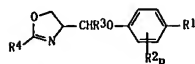


RN 167087-42-5 CAPLUS  
 CN Carbanic acid, [1-[[[2-(4-chlorophenoxy)-1-cyanoethyl]amino]carbonyl]-2-methylpropyl]-, phenyl ester (9C1) (CA INDEX NAME)



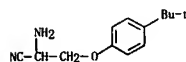
L4 ANSWER 52 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1994:54537 CAPLUS  
 DOCUMENT NUMBER: 120:54537  
 TITLE: Preparation of 4-(phenoxyalkyl)-2-oxazolines as acaricides and insecticides  
 INVENTOR(S): Hirose, Taro; Kikada, Hiroshi; Saito, Shigeru; Fujimoto, Hiroaki  
 PATENT ASSIGNEE(S): Sumitomo Chemical Co., Ltd., Japan  
 SOURCE: Eur. Pat. Appl., 53 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 553623	A1	19930804	EP 1993-100223	19930108
EP 553623	B1	20010404		
R: CH, DE, ES, FR, GB, IT, LI				
AU 9230491	A	19930729	AU 1992-30491	19921231
AU 658955	B2	19950504		
ES 2155442	T3	20010516	ES 1993-100223	19930108
BR 9300299	A	19930803	BR 1993-299	19930127
JP 05271206	A	19931019	JP 1993-11698	19930127
JP 9235608	B2	20011217		
US 5411979	A	19950502	US 1993-10015	19930127
PRIORITY APPL. INFO.:			JP 1992-12967	A 19920128
OTHER SOURCE(S):			CASREACT 120:54537; MARPAT 120:54537	
GRAPHIC IMAGE:				



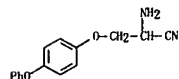
ABSTRACT:  
 Title compds. [1: H, halo, (halo)alkyl, alkoxy, etc.; R2 = H, halo, alkyl, alkoxy, alkylthio; R3 = H, Me; R4 = (substituted) Ph; p = 1-4] were prepared. Thus, 4-(Me3C)C6H4OH was condensed with RCH2CH(OMe)2 and the product converted in 4 steps to 4-(Me3C)C6H4OCH2CH(NH2)CH2OH which was cyclocondensed with 2,6-F2C6H2COCl to give 1 (R1 = CMe3, R2 = R3 = H, R4 = C6H3F2-2,6) which gave ≥90% control of Culex pipiens pallens larvae in H2O containing 3.5 ppm.

IT 151857-09-0P 151857-10-2P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and reaction of, in preparation of acaricide and insecticide)  
 RN 151857-09-9 CAPLUS  
 CN Propanenitrile, 2-amino-3-[4-(1,1-dimethylethyl)phenoxy]- (CA INDEX NAME)

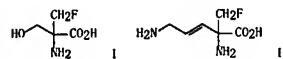


L4 ANSWER 52 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

RN 151857-10-2 CAPLUS  
 CN Propanenitrile, 2-amino-3-(4-phenoxyphenoxy)- (CA INDEX NAME)

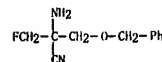


L4 ANSWER 53 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1993:650429 CAPLUS  
 DOCUMENT NUMBER: 119:250429  
 TITLE: A versatile entry into the synthesis of α-(monofluoromethyl) amino acids: preparation of α-(monofluoromethyl)serine and (E)-dehydro-α-(monofluoromethyl)ornithine  
 AUTHOR(S): Van Hijfte, Luc; Heydt, Veronique; Kolb, Michael  
 CORPORATE SOURCE: Strasbourg Res. Cent., Marion Merrell Dow Res. Inst., Strasbourg, 67009, Fr.  
 SOURCE: Tetrahedron Letters (1993), 34(30), 4793-6  
 CODEN: TELEAV; ISSN: 0040-4039  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 119:250429  
 GRAPHIC IMAGE:



ABSTRACT:  
 A new entry to the synthesis of α-(monofluoromethyl) amino acids is described. The synthesis is based on a Strecker reaction on an α-(monofluoromethyl) ketone. As an example, α-(monofluoromethyl)serine I was synthesized and used as starting material for a new synthesis of (E)-dehydro-α-(monofluoromethyl)ornithine II.

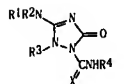
IT 151028-29-4P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and hydrolysis of)  
 RN 151028-29-4 CAPLUS  
 CN Propanenitrile, 2-amino-2-(fluoromethyl)-3-(phenylmethoxy)- (CA INDEX NAME)



L4 ANSWER 54 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1993:191742 CAPLUS  
 DOCUMENT NUMBER: 118:191742  
 TITLE: Preparation of 5-amino-2-carbamoyltriazolin-3-ones as herbicides  
 INVENTOR(S): Findeisen, Kurt; Kuhn, Dietmar; Mueller, Klaus  
 Helmut; Koenig, Klaus; Luerssen, Klaus; Santel, Hans  
 Joachim; Schmidt, Robert Rudolf  
 SOURCE: Bayer A.-G., Germany  
 Ger. Offen., 56 pp.  
 CODEN: GWXXBX  
 DOCUMENT TYPE: Patent  
 LANGUAGE: German  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 4116115	A1	19921119	DE 1991-4116115	19910517
WO 9220663	A1	19921126	WO 1992-EP968	19920504
W: AU, BR, CA, CS, HU, JP, KR, RU, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LU, MC, NL, SE				
AU 9216800	A	19921230	AU 1992-16800	19920504
AU 655019	B2	19941201		
EP 586418	A1	19940316	EP 1992-909880	19920504
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, SE				
BR 9205999	A	19940927	BR 1992-5999	19920504
PRIORITY APPLN. INFO.:			DE 1991-4116115	A 19910517
			WO 1992-EP968	A 19920504

OTHER SOURCE(S): MARPAT 118:191742  
 GRAPHIC IMAGE:



ABSTRACT:  
 Title compds. I [R1, R2 = (substituted) alkyl, -aryl, -heteroaryl, etc.; R1R2N = (substituted) heterocyclyl; R3 = (cyclo)alkyl; R4 = (substituted) alkyl, -cycloalkyl, -aryl, -aroyl, alkoxy, etc.; X = O, S] were prepared as herbicides (no data). Thus, addition reaction of 1-methyl-5-N-ethyl-N-methylamino-1,2-dihydro-3H-1,2,4-triazol-3-one (preparation given) with 4-MeC6H4CH2CH2CMe2CO in MeCN containing DBU gave title compound I [R1 = Et; R2 = R3 = Me; R4 = CHMeCH2CH2CMe2CO; X = O] (II) in 81% yield. Numerous I were said to be superior postemergent herbicides.

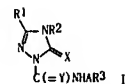
IT 146229-87-OP  
 RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as herbicide)  
 RN 146229-87-0 CAPLUS  
 CN 1H-1,2,4-Triazole-1-carboxamide, N-[2-[(4-chlorophenyl)thio]-1-cyano-1-methylethyl]-3-(dimethylamino)-2,5-dihydro-4-methyl-5-oxo- (CA INDEX NAME)

L4 ANSWER 55 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1993:101965 CAPLUS  
 DOCUMENT NUMBER: 118:101965  
 TITLE: Preparation of substituted triazolinones as herbicides  
 INVENTOR(S): Findeisen, Kurt; Kuhn, Dietmar; Mueller, Klaus  
 Helmut; Haug, Michael; Koenig, Klaus; Luerssen, Klaus;  
 Santel, Hans Joachim; Schmidt, Robert R.  
 SOURCE: Bayer A.-G., Germany  
 Eur. Pat. Appl., 34 pp.  
 CODEN: EPAXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: German  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 513621	A1	19921119	EP 1992-107530	19920504
R: BE, CH, DE, DK, ES, FR, GB, IT, LI, NL				
DE 4115615	A1	19921119	DE 1991-4115615	19910514
AU 9215912	A	19921119	AU 1992-15912	19920430
AU 644055	B2	19931202		
US 5209769	A	19930511	US 1992-878149	19920504
JP 05194435	A	19930803	JP 1992-141065	19920507
CA 2068356	A1	19921115	CA 1992-2068356	19920511
BR 9201807	A	19921229	BR 1992-1807	19920513
PRIORITY APPLN. INFO.:			DE 1991-4115615	A 19910514

OTHER SOURCE(S): MARPAT 118:101965

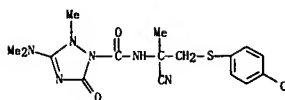
GRAPHIC IMAGE:



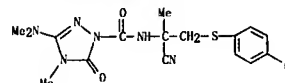
ABSTRACT:  
 Title compds. I [R1 = NR4R5, SR6; R2 = alkyl; R3 = (substituted) aryl, -cycloalkyl, -heterocyclyl; A = CR7R8CR9R10(CH2)m(CH2)n, CR7R8CH2CH2, CR7R8C(CH2)mCH2, CR7R8N; X, Y = O, S; R4 = H, alkyl; R5, R6 = alkyl; R7 = H, cyano, alkyl and R8-R10 = H, alkyl or R7R8 = (CH2)p; Q = O, S, SO, SO2, NR11; R11 = H] (substituted) alkyl, alkanoyl; m = n = 0-2; p = 2-6] were prepared as herbicides. Thus, treatment of 1-(4-chlorophenyl)-2-propylamine with CUC12 gave the isocyanate. Addition of 3-dimethylamino-4-methyl-1,2,4-triazolin-5-one in the presence of DBU gave title compound I [R1 = Me2N; R2 = Me; R3 = 4-ClC6H4; A = CHMeCH2; X = Y = O] (II) in 84% yield. II is effective both pre- and postemergent.

IT 146015-67-OP 146015-82-9P 146015-83-OP  
 146015-84-IP  
 RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as herbicide)  
 RN 146015-67-0 CAPLUS  
 CN 1H-1,2,4-Triazole-1-carboxamide, N-[2-[(4-chlorophenyl)thio]-1-cyano-1-methylethyl]-3-(dimethylamino)-4,5-dihydro-4-methyl-5-oxo- (CA INDEX NAME)

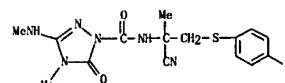
L4 ANSWER 54 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



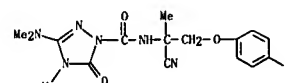
L4 ANSWER 55 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



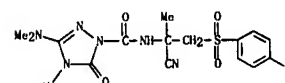
RN 146015-82-9 CAPLUS  
 CN 1H-1,2,4-Triazole-1-carboxamide, N-[2-[(4-chlorophenyl)thio]-1-cyano-1-methylethyl]-4,5-dihydro-4-methyl-5-oxo- (CA INDEX NAME)



RN 146015-83-0 CAPLUS  
 CN 1H-1,2,4-Triazole-1-carboxamide, N-[2-(4-chlorophenyl)-1-cyano-1-methylethyl]-3-(dimethylamino)-4,5-dihydro-4-methyl-5-oxo- (CA INDEX NAME)

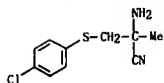


RN 146015-84-1 CAPLUS  
 CN 1H-1,2,4-Triazole-1-carboxamide, N-[2-[(4-chlorophenyl)sulfonyl]-1-cyano-1-methylethyl]-3-(dimethylamino)-4,5-dihydro-4-methyl-5-oxo- (CA INDEX NAME)



IT 146016-17-3P  
 RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of, as intermediate for herbicides)  
 RN 146016-17-3 CAPLUS  
 CN Propanenitrile, 2-amino-3-[(4-chlorophenyl)thio]-2-methyl- (CA INDEX NAME)

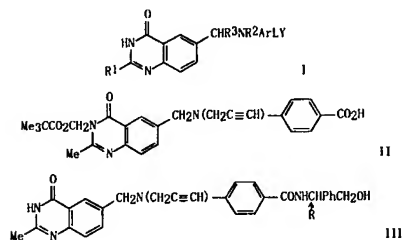
L4 ANSWER 55 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 56 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1992:194334 CAPLUS  
 DOCUMENT NUMBER: 116:194334  
 TITLE: Preparation of [(quinazolinylmethyl)amino]benzamides and related compounds as antitumor agents  
 INVENTOR(S): Andrew, Robert George; Barker, Andrew John; Boyle, Francis Thomas; Wardleworth, James Michael  
 PATENT ASSIGNEE(S): Imperial Chemical Industries PLC, UK; National Research Development Corp.  
 SOURCE: Eur. Pat. Appl., 58 pp.  
 CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 459730	A2	19911204	EP 1991-304757	19910524
EP 459730	A3	19930120		
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE				
AU 9177075	A	19911205	AU 1991-77075	19910516
AU 640016	B2	19930812		
ZA 9103730	A	19920226	ZA 1991-3730	19910516
CA 2042922	A1	19911201	CA 1991-2042922	19910521
HU 57739	A2	19911230	HU 1991-1768	19910527
NO 9102071	A	19911202	NO 1991-2071	19910529
JP 04235173	A	19920824	JP 1991-124260	19910529
FI 9102600	A	19911201	FI 1991-2600	19910530
GB 2244708	A	19911211	GB 1991-11656	19910530
GB 2244708	B	19931208		
US 5280027	A	19940118	US 1991-708046	19910530
PRIORITY APPL. INFO.:			GB 1990-1989	A 19900530
OTHER SOURCE(S):		MARPAT 116:194334		
GRAPHIC IMAGE:				



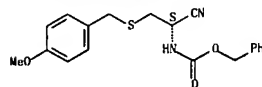
## ABSTRACT:

L4 ANSWER 56 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

Title compds. I [R1 = H, NH2, Cl-4 alkyl, Cl-4 alkoxy, substituted Cl-3 alkyl, Cl-3 hydroxyalkoxy, Cl-4 alkoxyalkoxy, etc.; quinazoline ring may have one more substituent; R2 = H, Cl-4 alkyl, -alkenyl, -alkynyl, -hydroalkyl, -haloalkyl, -cyanoalkyl; R3 = H, Cl-3 alkyl; Ar = (substituted) phenylene, (substituted) heterocyclylene; L = CONH, NHCO, CONR4, NR4CO, CH2CH, CO2; R4 = Cl-4 alkyl; Y = A1CR5(A3V3)A2Y2; R5 = H, Cl-3 alkyl; A1, A2 = bond, Cl-4 alkylene; A3 = bond, (substituted) Cl-4 alkylene; Y2 = OH, NH2, cyano, halo, CF3, Cl-4 alkoxy, -(di)alkylamino, -haloalkyl, aryl, etc.; Y3 = Y2, SO3H, CONH, CONHN, etc.; with provisos] were prepd. as antitumor agents. Thus, benzoic acid deriv. II (prepn. given) was converted to the acid chloride, which was amidated by (-)-(2R)-2-amino-2-phenylethanol to give a protected amide, which was deprotected to give title compd. III. Another I [R1 = Me; R2 = propargyl; R3 = H; Ar = 1,4-phenylene; L = CONH; Y = Ph2CH] had IC50 of approx. 7  $\mu$ M in vitro against L1210 leukemia cells.

IT 140373-50-8P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation of, as intermediate for antitumor agents)  
 RN 140373-50-8 CAPLUS  
 CN Carbanic acid, [1-cyano-2-[[[4-methoxyphenyl]methyl]thio]ethyl]-, phenylmethyl ester, (S)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

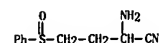


L4 ANSWER 57 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

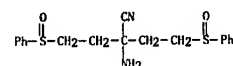
ACCESSION NUMBER: 1991:656601 CAPLUS  
 DOCUMENT NUMBER: 115:256601  
 TITLE: Preparation of 2-substituted vinylamino acid derivatives  
 AUTHOR(S): Opio, J. Osuku; Labidalle, S.; Galons, H.; Wiocque, M.; Zaporucha, A.; Loupy, A.  
 CORPORATE SOURCE: Lab. Chim. Org., Fac. Pharm., Paris, 75270, Fr.  
 SOURCE: Synthetic Communications (1991), 21(17), 1743-54  
 CODEN: SYNCAY; ISSN: 0039-7911  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 115:256601  
 ABSTRACT:

Michael addition of imines RCH(R1)N:CPH2 (R = H, CH2CH2SO3H, R1 = CN, CO2Et; R = Me, Bu, CH2CH:CH2, R1 = CN) to acceptors H2C:CHR2 (R2 = SO3H, CN, CO2Et, COMe) under phase-transfer conditions in the absence of solvent gave adducts R2CH2CH2CHR1N:CPH2 (I) in 50-95% yields. I (R1 = CN, R2 = SO3H) underwent thermolysis in refluxing xylene to give vinyl derivs. H2C:CHCR(CN)N:CPH2 in 60-86% yields. I (R = CH2CH2SO3H, R1 = CN, R2 = SO3H) was converted into  $\alpha,\alpha$ -divinylglycine derivative BzNHC(H:CH2)2CO2Et by hydrolysis and thermolysis reactions.

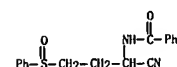
IT 137283-23-9P 137283-26-2P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and amidation of, with benzoyl chloride)  
 RN 137283-23-9 CAPLUS  
 CN Butanenitrile, 2-amino-4-(phenylsulfinyl)- (CA INDEX NAME)



RN 137283-26-2 CAPLUS  
 CN Butanenitrile, 2-amino-4-(phenylsulfinyl)-2-[2-(phenylsulfinyl)ethyl]- (CA INDEX NAME)



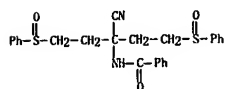
IT 137283-24-OP 137283-27-3P 137283-28-4P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and thermolysis of)  
 RN 137283-24-0 CAPLUS  
 CN Benzamide, N-[1-cyano-3-(phenylsulfinyl)propyl]- (CA INDEX NAME)



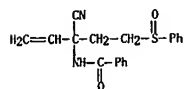
RN 137283-27-3 CAPLUS  
 CN Benzamide, N-[1-cyano-3-(phenylsulfinyl)-1-[2-



L4 ANSWER 57 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
(phenylsulfiny)ethyl]propyl]- (CA INDEX NAME)

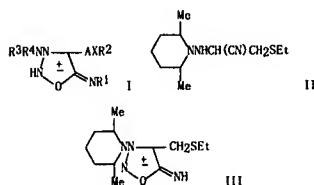


RN 137283-28-4 CAPLUS  
CN Benzamide, N-[1-cyano-1-[2-(phenylsulfiny)ethyl]-2-propenyl]- (9CI) (CA INDEX NAME)



L4 ANSWER 58 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
ACCESSION NUMBER: 1991:122388 CAPLUS  
DOCUMENT NUMBER: 114:122388  
TITLE: Antihypertensive aminosydnonimines  
INVENTOR(S): Kujath, Eckard; Baumgartner, Christian; Schoenafinger, Karl; Beyerle, Rudi; Just, Melitta; Bohn, Helmut; Ostrowski, Joerg  
PATENT ASSIGNEE(S): Cassella A.-G., Germany  
SOURCE: Ger. Offen., 17 pp.  
CODEN: GWXXBX  
DOCUMENT TYPE: Patent  
LANGUAGE: German  
FAMILY ACC. NUM. COUNT: 1  
PATENT INFORMATION:

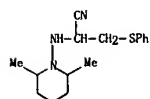
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3921460	A1	19910103	DE 1989-3921460	19890630
US 5079244	A	19920107	US 1990-534152	19900607
EP 406661	A1	19910109	EP 1990-112031	19900625
R: AT, BE, CH, DE, DK, ES, FR, GB, IT, LI, NL, SE				
JP 03128367	A	19910531	JP 1990-168612	19900628
CA 2020216	A1	19901231	CA 1990-2020216	19900629
ZA 9005099	A	19910424	ZA 1990-5099	19900629
DD 297972	A5	19920130	DD 1990-342361	19900629
HU 58730	A2	19920330	HU 1990-4037	19900629
PRIORITY APPL. INFO.:			DE 1989-3921460	A 19890630
OTHER SOURCE(S):			CASREACT 114:122388; MARPAT 114:122388	
GRAPHIC IMAGE:				



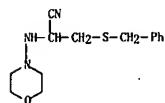
ABSTRACT:  
Aminosydnonimines I (A = C1-6 alkylene; X = O, S; R1 = H, acyl; R2 = C6 alkyl, alkenyl, alkynyl, aralkyl, aryl; R3, R4 = alkyl, alkenyl, alkynyl, cycloalkyl, aralkyl, S-heterocyclic or their S-oxides; NR3R4 = heterocyclic) were prepared by nitrosation-cyclization of R3R4NNHCH(CN)AXR2. Thus, 1-amino-2,6-dimethylpiperidine was treated with EtSCH2CHO and NaCN to give the nitrile II which was treated with NaNO2-HCl to give the sydnonimine III. I have antihypertensive activity (no data).

IT 132425-59-3P 132425-62-8P 132425-64-0P  
132425-71-9P 132425-73-1P  
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

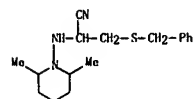
L4 ANSWER 58 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
(prepn., nitrosation, and cyclization of)  
RN 132425-59-3 CAPLUS  
CN Propanenitrile, 2-[(2,6-dimethyl-1-piperidyl)amino]-3-(phenylthio)- (CA INDEX NAME)



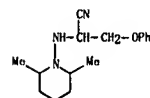
RN 132425-62-8 CAPLUS  
CN Propanenitrile, 2-(4-morpholinylamino)-3-[(phenylmethyl)thio]- (CA INDEX NAME)



RN 132425-64-0 CAPLUS  
CN Propanenitrile, 2-[(2,6-dimethyl-1-piperidyl)amino]-3-[(phenylmethyl)thio]- (CA INDEX NAME)

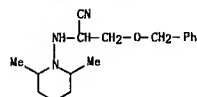


RN 132425-71-9 CAPLUS  
CN Propanenitrile, 2-[(2,6-dimethyl-1-piperidyl)amino]-3-phenoxy- (CA INDEX NAME)

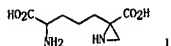


RN 132425-73-1 CAPLUS  
CN Propanenitrile, 2-[(2,6-dimethyl-1-piperidyl)amino]-3-(phenylmethoxy)- (CA INDEX NAME)

L4 ANSWER 58 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

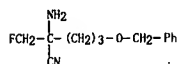


L4 ANSWER 59 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1990-459808 CAPLUS  
 DOCUMENT NUMBER: 113:59808  
 TITLE: 2-(4-Amino-4-carboxybutyl)aziridine-2-carboxylic acid.  
 A potent irreversible inhibitor of diaminopimelic acid  
 epimerase. Spontaneous formation from  
 $\alpha$ -(halomethyl)diaminopimelic acids  
 Gerhart, Fritz; Higgins, William; Tardif, Chantal;  
 Ducep, Jean Bernard  
 CORPORATE SOURCE: Strasbourg Cent., Merrell Dow Res. Inst., Strasbourg,  
 67084, Fr.  
 SOURCE: Journal of Medicinal Chemistry (1990), 33(8), 2157-62  
 CODEN: JMCMAR; ISSN: 0022-2623  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 113:59808  
 GRAPHIC IMAGE:



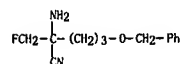
ABSTRACT:  
 The title compound (I) was identified as the product of spontaneous hydrolysis of  
 $\alpha$ -(halomethyl)diaminopimelic acids  $RCH_2C(NH_2)(CO_2H)CH_2CH_2CH_2CH(NH_2)CO_2H$   
 (II, R = F, Cl, Br). Under physiol. conditions, I is an extremely potent  
 irreversible inhibitor of the bacterial enzyme diaminopimelic acid epimerase  
 (EC 5.1.1.7). This unusual mode of action of an  $\alpha$ -(halomethyl) amino acid  
 with a nonpyridoxal enzyme is investigated. Synthesis and characterization of  
 I and II, kinetics of spontaneous formation of I from II, and kinetics of  
 enzyme inhibition by both I and II are reported.

IT 82212-55-3P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (preparation and cyclocondensation of, with phthaloyl dichloride)  
 RN 82212-55-3 CAPLUS  
 CN Pentanenitrile, 2-amino-2-(fluoromethyl)-5-(phenylmethoxy)- (CA INDEX  
 NAME)

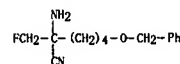


L4 ANSWER 60 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 CH2Ph, CH2C6H4OH-p; R3 = H, Cl-4 alkylcarbonyl; Y = CH2F, CH2Cl, useful as  
 ornithine decarboxylase inhibitors, and their intermediate lactams (II): Y =  
 CH2F, CH2Cl; n = 3, 4) were prepd. Esterification of 2,6-diaminohexanoic  
 acid-HCl with MeOH in the presence of HCl and Schiff base formation of the  
 resulting Me ester with PhCHO gave Me 2,6-bis(benzylideneamino)hexanoate.  
 Deprotection of the latter comp. with NaH in (Me2N)3PO followed by alkylation  
 with ClCH2F and hydrolysis with N aq. HCl gave Me 2-fluoromethyl-2,6-  
 diaminohexanoate-2HCl which was treated with NaOMe/MeOH to give  
 2-amino-3-fluoromethyl-2-piperidone. Hydrolysis of the latter comp. in  
 refluxing 6N aq. HCl gave 2-fluoromethyl-2,5-diaminopentanoic acid-HCl (III).  
 III in vivo showed 70.5  $\pm$  12.5 % ornithine decarboxylase activity in ventral  
 prostate of rats at 5 h after a single i.p. injection.

IT 82212-55-3P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (preparation and imidation of, with phthaloyl dichloride)  
 RN 82212-55-3 CAPLUS  
 CN Pentanenitrile, 2-amino-2-(fluoromethyl)-5-(phenylmethoxy)- (CA INDEX  
 NAME)



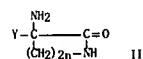
IT 82212-84-8P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (preparation and phthaloylation of)  
 RN 82212-84-8 CAPLUS  
 CN Hexanenitrile, 2-amino-2-(fluoromethyl)-6-(phenylmethoxy)- (CA INDEX  
 NAME)



L4 ANSWER 60 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1989:76067 CAPLUS  
 DOCUMENT NUMBER: 110:76067  
 TITLE: Preparation of 2-chloromethyl or 2-fluoromethyl-2-  
 amino acid derivatives as ornithine decarboxylase  
 inhibitors  
 Inventor(s): Bey, Philippe; Jung, Michel  
 Patent Assignee(s): Merrell Dow France et Cie., Fr.  
 Source: U.S., 17 pp. Cont.-in-part of U.S. Ser. No. 53,937,  
 abandoned.  
 CODEN: USXXAM  
 Document Type: Patent  
 Language: English  
 Family Acc. Num. Count: 8  
 Patent Information:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 4743691	A	19880510	US 1982-392052	19820625
US 4438270	A	19840320	US 1982-392051	19820625
US 4496588	A	19850129	US 1983-487243	19830428
US 4560795	A	19851224	US 1984-577116	19840206
US 4866206	A	19890912	US 1988-148806	19880127
US 5614557	A	19970325	US 1996-403531	19950314
PRIORITY APPL. INFO.:				
		US 1977-814765	A1	19770711
		US 1979-53937	A2	19790702
		US 1979-28757	B1	19790410
		US 1979-28758	A1	19790410
		US 1980-204749	B2	19801107
		US 1981-262834	B1	19810512
		US 1982-382265	B3	19820526
		US 1982-392051	A3	19820625
		US 1982-392052	A3	19820625
		US 1982-373198	A1	19820929
		US 1984-639977	B1	19840810
		US 1987-110639	B1	19871015
		US 1988-228789	B1	19880804
		US 1989-334733	B1	19890406
		US 1989-431685	B1	19891103
		US 1990-534008	B1	19900601
		US 1991-759633	B1	19910912
		US 1992-874989	B1	19920424
		US 1993-2521	B1	19930111
		US 1993-137397	B1	19931014
		US 1994-284706	B1	19940802

OTHER SOURCE(S): CASREACT 110:76067; MARPAT 110:76067  
 GRAPHIC IMAGE:

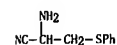


ABSTRACT:  
 ZC(NH3)(COR)Y [I; R = OH, Cl-8 alkoxy; Z =  $\gamma$ -guanidinopropyl,  
 R1NH(CH2)n; R1 = H, Cl-4 alkylcarbonyl, R2CH(NH2)CO; n = 3, 4; R2 = Cl-4 alkyl.

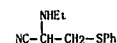
L4 ANSWER 61 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1988:21421 CAPLUS  
 DOCUMENT NUMBER: 108:21421  
 TITLE: Ketene equivalents. II. A formylcarbonium ion  
 synthon. Synthesis of 3-thio-substituted 2-amino  
 acids and thio-substituted enamines from  
 2-acyloxycarboxylic acids  
 Inventor(s): Oka, Akira; Horie, Naofumi; Harada, Toshiro  
 Corporate Source: Dep. Chem., Kyoto Inst. Technol., Kyoto, 606, Japan  
 Source: Bulletin of the Chemical Society of Japan (1987),  
 60(2), 609-12  
 CODEN: BCSJAS; ISSN: 0009-2673  
 Document Type: Journal  
 Language: English  
 Other Source(s): CASREACT 108:21421

ABSTRACT:  
 RSCCH2CH(CN)O2CR1 (I; R = Ph, Et; R1 = Ph, OMe3, Me) were prepared by Michael  
 addition of the appropriate RSH to CH2=C(CN)O2CR1. Amination of I (R = Ph; R1 =  
 Me) (II) with NH3 followed by hydrolysis in aqueous HBr gave S-phenylcysteine in  
 63% overall yield. Amination of II with pyrrolidine or Et3NH followed by  
 pyrolysis gave PhSCH:CHNR22 [R22 = (CH2)4, Et2].

IT 111248-44-3P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT  
 (Reactant or reagent)  
 (preparation and acidic hydrolysis of)  
 RN 111248-44-3 CAPLUS  
 CN Propanenitrile, 2-amino-3-(phenylthio)- (CA INDEX NAME)



IT 111248-43-2P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation of)  
 RN 111248-43-2 CAPLUS  
 CN Propanenitrile, 2-(ethylamino)-3-(phenylthio)- (CA INDEX NAME)

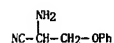


L4 ANSWER 62 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1987:575676 CAPLUS  
 DOCUMENT NUMBER: 107:175676  
 TITLE: New process for obtaining (alpha)-amino nitriles and their applications to organic synthesis  
 INVENTOR(S): Moineau, Gerard; Imbert, Thierry  
 PATENT ASSIGNEE(S): Rolland, Albert, S. A., Fr.  
 SOURCE: PCT Int. Appl., 26 pp.  
 CODEN: PIXXD2  
 DOCUMENT TYPE: Patent  
 LANGUAGE: French  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 8702980	A1	19870521	WO 1986-FR391	19861119
W: AU, DK, FI, HU, JP, KR, NO, SU, US				
RW: AT, BE, CF, CG, CH, CM, DE, FR, GA, GB, IT, LU, ML, MR, NL, SE, SN, TD, TG				
FR 2590252	A1	19870522	FR 1985-17214	19851119
FR 2590252	B3	19880909		
AU 8666248	A	19870602	AU 1986-66248	19861119
EP 245417	A1	19871119	EP 1986-906847	19861119
EP 245417	B1	19920304		
R: DE, FR, GB, IT				
US 4942221	A	19900717	US 1987-86731	19870804
US 5103019	A	19920407	US 1990-518086	19900502
PRIORITY APPLN. INFO.:			FR 1985-17214	A 19851119
			WO 1986-FR391	A 19861119
			US 1987-86731	A3 19870804

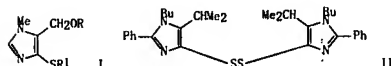
OTHER SOURCE(S): MARPAT 107:175676  
 ABSTRACT:  
 RR(CN)(NH2) (I: R = cycloalkyl, aliphatic, aromatic; R1 = H, alkyl, aryl) are prepared for use as intermediates for the preparation of amino acids. A PhMe solution of 0.665 g phenoxycetonitrile was reduced under an Ar atmosphere using Dibal at 0°. After stirring for 1 h at 0° the reaction mixture was treated with 1.3 equiv Et2AlCN and hydrolyzed to give 27% 2-amino-3-phenoxypropionitrile.

IT 110888-09-OP 110888-13-6P 110888-14-7P  
 RL: SPN (Synthetic preparation); PREP (Preparation)  
 (preparation of)  
 RN 110888-09-0 CAPLUS  
 CN Propanenitrile, 2-amino-3-phenoxy- (CA INDEX NAME)



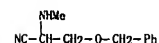
RN 110888-13-6 CAPLUS  
 CN Benzenepropanenitrile, α-amino-α-(phenoxymethyl)- (CA INDEX NAME)

L4 ANSWER 63 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1987:477706 CAPLUS  
 DOCUMENT NUMBER: 107:77706  
 TITLE: New synthesis of 4- and 5-imidazolethiols  
 AUTHOR(S): Spaltenstein, Andreas; Holler, Tod P.; Hopkins, Paul R.  
 CORPORATE SOURCE: Dep. Chem., Univ. Washington, Seattle, WA, 98195, USA  
 SOURCE: Journal of Organic Chemistry (1987), 52(14), 2977-9  
 CODEN: JOCEAH; ISSN: 0022-3263  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 OTHER SOURCE(S): CASREACT 107:77706  
 GRAPHIC IMAGE:

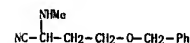


ABSTRACT:  
 The preparation of 7 title compds. (e.g., I: R = tetrahydropyranyl, R1 = PhCH2; R = PhCH2, R1 = H; and II) is described. Thus, ROCH2CHO (R = tetrahydropyranyl) was treated with MeNH2.HCl and NaCN in aqueous MeOH to give 69% R2NMeCH(CN)CH2OR (III, R = tetrahydropyranyl, R2 = H), which was treated with HCO2H and 1,1'-carbonyldiimidazole to give 84% III (R2 = HCO). Treating III (R2 = CHO) with H2S and Et3N in EtOH gave 90% H2NCSCH(NMeCH)CH2OR as a mixture of 2 diastereomers. Cyclization of the latter compds. by treatment with CF3SO3SiMe3-Et3N in CH2Cl2 and then NaBH4, followed by PhCH2Br gave 69% I (R = tetrahydropyranyl, R1 = PhCH2).

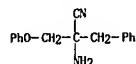
IT 108560-41-4P 108560-42-5P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and amidation of)  
 RN 108560-41-4 CAPLUS  
 CN Propanenitrile, 2-(methylamino)-3-(phenylmethoxy)- (CA INDEX NAME)



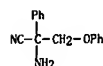
RN 108560-42-5 CAPLUS  
 CN Butanenitrile, 2-(methylamino)-4-(phenylmethoxy)- (CA INDEX NAME)



L4 ANSWER 62 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

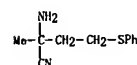


RN 110888-14-7 CAPLUS  
 CN Benzenecetonitrile, α-amino-α-(phenoxymethyl)- (CA INDEX NAME)



L4 ANSWER 64 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1986:160953 CAPLUS  
 DOCUMENT NUMBER: 104:160953  
 ORIGINAL REFERENCE NO.: 104:25289a, 25292a  
 TITLE: Synthesis and spectroscopic properties of Co(salen) derivatives containing pendant thioether groups and their dioxygen adducts  
 AUTHOR(S): Nakamoto, Kazuo; Oshio, Hiroki; Okawa, Hisashi; Kanda, Wakako; Horiuchi, Kaoru; Kida, Shigeo  
 CORPORATE SOURCE: Marquette Univ., Milwaukee, WI, 53233, USA  
 SOURCE: Inorganica Chimica Acta (1985), 108(4), 231-5  
 CODEN: ICHAA3; ISSN: 0020-1693  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 ABSTRACT:  
 CoL (H2L = o-HOC6H4CH=NMe(CH2CH2SR)CH2N:CHC6H4OH-o (R = iso-Pr, Ph) were prepared. Electronic and ESR spectra in CH2Cl2 show that CoL (R = iso-Pr) is 5-coordinate with pendant thioether coordination at 5198 K whereas the CoL (R = Ph) is 4-coordinate at 198 K and becomes a mixture of the 4- and 5-coordinate species at liquid N temperature. Upon reaction with O2 at low temps., both complexes form dioxygen adducts in which the pendant thioether groups are coordinated trans to dioxygen. Resonance Raman spectra show that CoL (R = iso-Pr) yields an equilibrium mixture of the 1:1 and 1:2(O2/Co) adducts at 190 K while CoL (R = Ph) forms only the 1:1 adduct under similar conditions. These differences between CoL can be attributed to the variance in basicity of their pendant S atoms.

IT 101370-89-2P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and reduction of)  
 RN 101370-89-2 CAPLUS  
 CN Butanenitrile, 2-amino-2-methyl-4-(phenylthio)- (CA INDEX NAME)



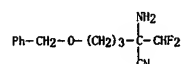
L4 ANSWER 65 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1984:22338 CAPLUS  
 DOCUMENT NUMBER: 100:22338  
 ORIGINAL REFERENCE NO.: 100:3501a, 3504a  
 TITLE: Fluorinated aminonitriles  
 INVENTOR(S): Gerhart, Fritz E.  
 PATENT ASSIGNEE(S): Merrell Toraude S. A., Fr.  
 SOURCE: U.S., 23 pp. Cont.-in part of U.S. Ser. No. 210,499, abandoned.  
 CODEN: USXXAM  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
US 4405530	A	19830920	US 1981-321505	19811116
GB 2083031	A	19820317	GB 1981-25475	19810820
GB 2083031	B	19840418		

PRIORITY APPL. INFO.:  
 US: 1980-210499 A2 19801126  
 GB 1981-25475 A 19810820  
 GB 1980-27503 A 19800823

ABSTRACT:  
 $\alpha$ -(Fluoromethyl)- $\alpha$ -aminonitriles,  $R_1CH_2CH:CHC(NH_2)(CFpH_3-p)CN$  ( $p = 1, 2$ ;  $R_1 = H, MeO, PhCH_2O, Ph_2CH_2O, Ph_3CO, CH_2:CHCH_2O$ ),  $R_1CH_2C((CH_2)CH_2C(NH_2)(CFpH_3-p)CN (R_1, p \text{ as above}), R_2O(CH_2)nC(NH_2)(CFpH_3-p)CN$  ( $R_2 = Me, PhCH_2, Ph_2CH, Ph_3C, CH_2:CHCH_2$ ;  $n = 3, 4$ ;  $p = 1, 2$ ),  $R_3CH_2C(NH_2)(CFpH_3-p)CN$  ( $R_3 = \text{substituted Ph, } p = 1, 2$ ),  $CH_2:CHCH_2C(NH_2)(CFpH_3-p)CN$  were prepared by treating a corresponding ketimine magnesium halide with HCN or with an alkali metal cyanide or ammonium cyanide and a proton source of sufficient acidity. Thus, Fluoromethylphthalimido benzoyloxyhexanenitrile from propenylmagnesium bromide, cooled to  $-40^\circ$ , the reaction mixture is then poured into a solution of NaCN and NH<sub>4</sub>Cl in H<sub>2</sub>O and kept 1 h at room temperature to give crude 2-(fluoromethyl)-2-amino-3-pentanenitrile (1:1 cis/trans mixture).

IT 88185-21-1P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (preparation of)  
 RN 88185-21-1 CAPLUS  
 CN Pentanenitrile, 2-amino-2-(difluoromethyl)-5-(phenylmethoxy)- (CA INDEX NAME)



IT 82212-84-8P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (preparation of, (fluoromethyl)phthalimido benzoyloxyhexanenitrile from)  
 RN 82212-84-8 CAPLUS  
 CN Hexanenitrile, 2-amino-2-(fluoromethyl)-6-(phenylmethoxy)- (CA INDEX NAME)

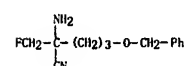
L4 ANSWER 66 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1982:438498 CAPLUS  
 DOCUMENT NUMBER: 97:38498  
 ORIGINAL REFERENCE NO.: 97:6571a, 6574a  
 TITLE: Aminonitrile derivatives  
 INVENTOR(S): Gerhart, Fritz  
 PATENT ASSIGNEE(S): Merrell Toraude S. A., Fr.  
 SOURCE: Eur. Pat. Appl., 77 pp. CODEN: EPXXDW  
 DOCUMENT TYPE: Patent  
 LANGUAGE: English  
 FAMILY ACC. NUM. COUNT: 2  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 46710	A1	19820303	EP 1981-401327	19810821
EP 46710	B1	19840613		
R: AT, BE, CH, DE, FR, IT, NL, SE				
DK 8103719	A	19820224	DK 1981-3719	19810821
NO 8102842	A	19820224	NO 1981-2842	19810821
NO 151460	B	19850102		
NO 151460	C	19850417		
AU 8174431	A	19820304	AU 1981-74431	19810821
AU 542144	B2	19850207		
JP 5707657	A	19820515	JP 1981-130352	19810821
JP 03030587	B	19910430		
ZA 8105807	A	19820825	ZA 1981-5807	19810821
ES 504882	A1	19830416	ES 1981-504882	19810821
CA 1164479	A1	19840327	CA 1981-384339	19810821
AT 7904	T	19840615	AT 1981-401327	19810821
IL 63636	A	19850830	IL 1981-63636	19810821

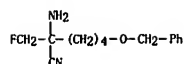
PRIORITY APPL. INFO.:  
 GB 1980-27503 A 19800823  
 US 1980-210499 A 19801126  
 EP 1981-401327 A 19810821

OTHER SOURCE(S): MARPAT 97:38498  
 ABSTRACT:  
 $H_2NCR(R)CN$  ( $R = \text{organic}$ ;  $R_1 = CH_2F, CH_2F_2$ ) were prepared as intermediates for  $H_2NCR(R)CO_2H$  with antitumor, protozoacidal, antihistaminic, and anti-Parkinsonism activity (no data). Thus, Grignard reaction of  $BrCH:CHMe$  with  $FCN_2CN$  gave cis- and trans- $H_2NCH_2CH_2F$  ( $CH_2CH:CHMe$  which were N-trifluoromethylated and brominated to give E- $CF_3CONHCH_2CH_2F$  ( $CH_2CH:CHCH_2Br$  (I). Amination of I with hexamethylenetetramine and hydrolysis gave E- $H_2NCH_2CH_2CH:CHCH_2F$  ( $NH_2$ )  $CO_2H$ .

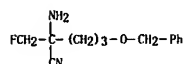
IT 82212-55-3P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT (Reactant or reagent)  
 (preparation and reaction of, with phthaloyl chloride)  
 RN 82212-55-3 CAPLUS  
 CN Pentanenitrile, 2-amino-2-(fluoromethyl)-5-(phenylmethoxy)- (CA INDEX NAME)



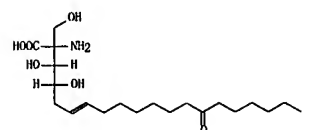
L4 ANSWER 65 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



IT 82212-55-3P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (preparation of, phthalimido derivative from)  
 RN 82212-55-3 CAPLUS  
 CN Pentanenitrile, 2-amino-2-(fluoromethyl)-5-(phenylmethoxy)- (CA INDEX NAME)



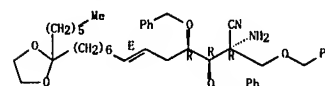
L4 ANSWER 67 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1981:425464 CAPLUS  
 DOCUMENT NUMBER: 95:25464  
 ORIGINAL REFERENCE NO.: 95:4455a, 4458a  
 TITLE: A total synthesis of the enantiomer of anhydromyricin (anhydrothermozomycin)  
 AUTHOR(S): Payette, Daniel R.; Just, George  
 CORPORATE SOURCE: Dep. Chem., McGill Univ., Montreal, QC, H3A 2K6, Can.  
 SOURCE: Canadian Journal of Chemistry (1981), 59(2), 269-82  
 CODEN: CJCHAG; ISSN: 0008-4042  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 GRAPHIC IMAGE:



ABSTRACT:  
 The optical antipode of anhydromyricin, the  $\gamma$ -lactone derived from the antibiotic myricin (thermozomycin), was synthesized from L-arabinose, establishing the absolute configuration of myricin as 1. In contrast to its natural enantiomer, it showed but little antifungal activity.

IT 78009-97-9P 78086-20-1P  
 RL: SPN (Synthetic preparation): PREP (Preparation)  
 (preparation of)  
 RN 78009-97-9 CAPLUS  
 CN 6-Tridecenitrile, 2-amino-13-(2-hexyl-1,3-dioxolan-2-yl)-3,4-bis(phenylmethoxy)-2-[(phenylmethoxy)methyl]-, [2R-(2R\*,3R\*,4R\*,6E)]-(9CI) (CA INDEX NAME)

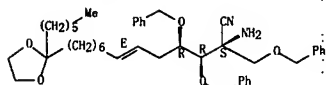
Absolute stereochemistry.  
 Double bond geometry as shown.



RN 78086-20-1 CAPLUS  
 CN 6-Tridecenitrile, 2-amino-13-(2-hexyl-1,3-dioxolan-2-yl)-3,4-bis(phenylmethoxy)-2-[(phenylmethoxy)methyl]-, [2S-(2R\*,3S\*,4S\*,6E)]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.  
 Double bond geometry as shown.

L4 ANSWER 67 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 68 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1981:175527 CAPLUS

DOCUMENT NUMBER: 94:175527

ORIGINAL REFERENCE NO.: 94:28703a, 28706a

TITLE: Synthesis of S-benzyl-DL-[1-13C]cysteine and its incorporation into oxytocin and [8-arginine]vasopressin and related compounds by total synthesis. Separation of diastereoisomers by partition chromatography and HPLC.

AUTHOR(S): Hruby, Victor J.; Viswanatha, V.; Yang, Young C. S.

CORPORATE SOURCE: Dep. Chem., Univ. Arizona, Tucson, AZ, 85721, USA

SOURCE: Journal of Labelled Compounds and Radiopharmaceuticals (1980), 17(6), 801-12

CODEN: JLCRD4; ISSN: 0362-4803

DOCUMENT TYPE: Journal

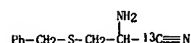
LANGUAGE: English

ABSTRACT: S-Benzyl-DL-cysteine-1-13C was prepared from Na13CN in 3 steps and then converted to its tert-butoxycarbonyl derivative, which was used in the solid-phase synthesis of oxytocin and vasopressin analogs. The above analogs were separated and purified by partition chromatog. and their purity was checked by high pressure liquid chromatog.

IT 77284-34-5P  
 RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT (Reactant or reagent)  
 (preparation and hydrolysis of)

RN 77284-34-5 CAPLUS

CN Propanenitrile-1-13C, 2-amino-3-[(phenylmethyl)thio]- (9C1) (CA INDEX NAME)



L4 ANSWER 69 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1980:604032 CAPLUS

DOCUMENT NUMBER: 93:204032

ORIGINAL REFERENCE NO.: 93:32544a, 32544a

TITLE: Asymmetrical syntheses. VII. Synthesis of optically active aminonitriles.

AUTHOR(S): Weinges, Klaus; Blackholm, Heinz

CORPORATE SOURCE: Org.-Chem. Inst., Univ. Heidelberg, Heidelberg.

SOURCE: D-6900/1, Fed. Rep. Ger. Chemische Berichte (1980), 113(9), 3098-102

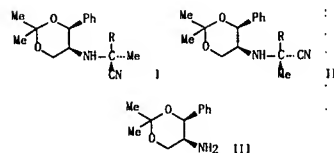
CODEN: CHBEAM; ISSN: 0009-2940

DOCUMENT TYPE: Journal

LANGUAGE: German

OTHER SOURCE(S): CASREACT 93:204032

GRAPHIC IMAGE:



## ABSTRACT:

The asym. syntheses of aminonitriles I [R = cyclopropyl, cyclopentyl, cyclohexyl, CH2C6H4R1 (R1 = o-NO2, p-NO2, o-Cl, p-Cl, o-Me, p-Me), C(OH)Me2, C(OMe)Me2, C(Ph)Me2, CH2OH, CH2OMe] and II (R = CH2OPh) were achieved by treating (4S,5S)-aminodioxane III with RCOMe and HCN. Absolute configurations of the new chiral centers and epimer equilibrium in solution were determined by NMR spectroscopy.

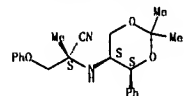
IT 75511-79-4P

RL: SPN (Synthetic preparation): PREP (Preparation): RACT (Reactant or reagent)  
 (asym. synthesis of)

RN 75511-79-4 CAPLUS

CN Propanenitrile, 2-[1-(2,2-dimethyl-4-phenyl-1,3-dioxan-5-yl)amino]-2-methyl-3-phenoxy-, [4S-[4a,5a(R\*)]]- (9C1) (CA INDEX NAME)

Absolute stereochemistry.



L4 ANSWER 70 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1980:595563 CAPLUS

DOCUMENT NUMBER: 93:185563

ORIGINAL REFERENCE NO.: 93:29559a, 29562a

TITLE: E/Z Equilibria. Part V. Azomethines, 1-azanyl anions, and metastable secondary enamines.

AUTHOR(S): Knorr, Rudolf; Weiss, Alfons; Loew, Peter; Raeppe, Edith

CORPORATE SOURCE: Inst. Org. Chem., Univ. Muenchen, Munich, D-8000/2, Fed. Rep. Ger.

SOURCE: Chemische Berichte (1980), 113(7), 2462-89

CODEN: CHBEAM; ISSN: 0009-2940

DOCUMENT TYPE: Journal

LANGUAGE: German

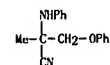
ABSTRACT: Ketone anils RCH2CR1:NR2 [1: R = Me, 1-cyclohexenyl, (un)substituted Ph, 1-naphthyl, PhO, PhS, PhSO, PhSO2, etc.; R1 = Me, Et; R2 = Ph, 3,5-xyllyl] were prepared and their configurations determined from 1H NMR chemical shifts. The E-Z equilibrium consts. for these compds. do not depend significantly on the inductive substituent effect. Metalation of I with LiN(CHMe2)2 gave 1-azanyl anions, the configurations of which depend on kinetic and thermodyn. control of the metalation reaction. Methanolysis of the anions gave metastable enamines RCH:CR1NR2 via regio- and stereospecific N-protonation. Substituent parameters  $\Delta\epsilon$  were estimated from the E-Z equilibrium data.

IT 75251-36-4P 75251-38-6P 75251-40-0P

RL: RCT (Reactant): SPN (Synthetic preparation): PREP (Preparation): RACT (Reactant or reagent)  
 (preparation and dehydrocyanation of)

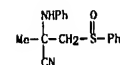
RN 75251-36-4 CAPLUS

CN Propanenitrile, 2-methyl-3-phenoxy-2-(phenylamino)- (CA INDEX NAME)



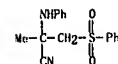
RN 75251-38-6 CAPLUS

CN Propanenitrile, 2-methyl-2-(phenylamino)-3-(phenylsulfinyl)- (CA INDEX NAME)



RN 75251-40-0 CAPLUS

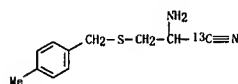
CN Propanenitrile, 2-methyl-2-(phenylamino)-3-(phenylsulfonyl)- (CA INDEX NAME)



L4 ANSWER 70 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)

L4 ANSWER 71 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN  
 ACCESSION NUMBER: 1980:426800 CAPLUS  
 DOCUMENT NUMBER: 93:26800  
 ORIGINAL REFERENCE NO.: 93:4517a, 4520a  
 TITLE: Torsion angles in the cystine bridge of oxytocin in aqueous solution. Measurements of circumjacent vicinal couplings between proton, carbon-13, and nitrogen-15  
 AUTHOR(S): Fischman, Alan J.; Live, David H.; Wyssbrod, Herman R.; Agosta, William C.; Cowburn, David  
 CORPORATE SOURCE: Rockefeller Univ., New York, NY, 10021, USA  
 SOURCE: Journal of the American Chemical Society (1980), 102(8), 2533-9  
 CODEN: JACSAT; ISSN: 0002-7863  
 DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 ABSTRACT: The six couplings from 1H $\alpha$ , 13C', and 15N' to the 2  $\beta$  protons were measured for the 2 half-cystyl residues in oxytocin, using a series of specifically designed and synthesized isotopic isomers. In the case of half-cystyl 1, the observed couplings suggest that the torsion angle  $\chi_1$  has the eclipsed value of  $-120^\circ$ . The value for this angle in the half-cystyl residue 6 is less clearly defined, but is probably also fixed. Using the same anal. as for  $\chi_{11}$ ,  $\chi_{61}$  is approx.  $+120^\circ$ . The stereochem. assignments of the  $\beta$  protons of the two residues were confirmed by stereoselective deuteration.

IT 73960-42-6P  
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)  
 (preparation and hydrolysis of)  
 RN 73960-42-6 CAPLUS  
 CN Propanenitrile-1-13C, 2-amino-3-[(4-methylphenyl)methyl]thio]- (9C1) (CA INDEX NAME)



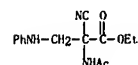
L4 ANSWER 72 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1977:579018 CAPLUS  
 DOCUMENT NUMBER: 87:179018  
 ORIGINAL REFERENCE NO.: 87:28255a, 28258a  
 TITLE: Amino acid derivatives as fungicides  
 INVENTOR(S): Ishida, Yasuo; Yakushiji, Kunito; Wakae, Osamu; Aoki, Isao; Masumoto, Keiichi  
 PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan  
 SOURCE: Jpn. Kokai Tokkyo Koho, 6 pp.  
 CODEN: JRXAF  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Japanese  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

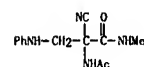
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 52021327	A	19770217	JP 1975-97931	19750811
			JP 1975-97931	A 19750811

PRIORITY APPLN. INFO.:  
 ABSTRACT: Amino acid deriva. are used as microbicides. Thus, N,N-dimethyl-2-acetamido-2-cyano-2-(propylthio)acetamide [PrSC(CN)(NHAc)CONMe2] [64205-24-9] sprayed on tomatoes at 250 ppm almost completely controlled Phytophthora infestans infection. This compound and 28 its analogs were prepared and their fungicidal activities presented.

IT 64205-38-5P 64205-39-6P  
 RL: AGR (Agricultural use); BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation and fungicidal activity of)  
 RN 64205-38-5 CAPLUS  
 CN Alanine, N-acetyl-2-cyano-3-(phenylamino)-, ethyl ester (CA INDEX NAME)



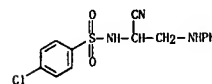
RN 64205-39-6 CAPLUS  
 CN Propanamide, 2-(acetylamino)-2-cyano-N-methyl-3-(phenylamino)- (CA INDEX NAME)



L4 ANSWER 73 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1974:120654 CAPLUS  
 DOCUMENT NUMBER: 80:120654  
 ORIGINAL REFERENCE NO.: 80:19415a, 19418a  
 TITLE: Reactions of 1-(p-chlorobenzenesulfonyl)-2-cyanoaziridine  
 AUTHOR(S): Markov, V. I.; Doroshenko, V. A.  
 CORPORATE SOURCE: Dnepropetr. Khim.-Tekhnol. Inst., Dnepropetrovsk, USSR  
 SOURCE: Ukrainskii Khimicheskii Zhurnal (Russian Edition) (1974), 40(1), 59-62  
 CODEN: UKZHAI; ISSN: 0041-6045  
 DOCUMENT TYPE: Journal  
 LANGUAGE: Russian  
 GRAPHIC IMAGE: For diagram(s), see printed CA Issue.  
 ABSTRACT: The aziridinecarbonitrile (I) was obtained in 90% yield by base-catalyzed cyclization of p-ClC6H4SO2NHCH2CH(CN)CN in dioxane. Treatment of I with HCl(g) in EtOAc at  $-5^\circ$  yielded 25% p-ClC6H4SO2NHCH(CH2Cl)CONH2. I was halogenated by LiCl or LiBr in AcOH at room temperature to give 52% and 12% of p-ClC6H4SO2NHCH(CH2X)CN (X = Cl, Br). p-ClC6H4SO2NHCH2CH(SCN)CN was obtained in 79% yield by treatment of I with KSCN; 48% p-ClC6H4SO2NHCH2CH(SPh)CN was obtained from I and PhSH. Addnl. obtained were p-ClC6H4SO2NHCH2CH(CN)CN (R = MeC6H4S, o-HO2CC6H4S, phthalimido) and p-ClC6H4SO2NHCH(CN)CH2R (R = PhNH, morpholino).

IT 51918-63-9P  
 RL: SPN (Synthetic preparation); PREP (Preparation) (preparation of)  
 RN 51918-63-9 CAPLUS  
 CN Benzenesulfonamide, 4-chloro-N-[1-cyano-2-(phenylamino)ethyl]- (CA INDEX NAME)



DOCUMENT TYPE: Journal  
 LANGUAGE: English  
 ABSTRACT:  
 p-ROCH<sub>3</sub>OCH<sub>2</sub>CH(NH<sub>2</sub>)CONH<sub>2</sub>, HCl (R = H) was prepared from p-PhCH<sub>2</sub>OCH<sub>2</sub>CH(NH<sub>2</sub>)CONH<sub>2</sub> (I) (I = H) and p-PhCH<sub>2</sub>CH(NH<sub>2</sub>)CONH<sub>2</sub> (II) by a series of reactions. II was acid-hydrolyzed and the resulting aldehyde converted by the Strecker reaction or by treatment with ammonium carbonate and KCN in EtOH at 50-60° for 2 hr to I (R = NH<sub>2</sub>, R<sub>1</sub> = CN). Hydrolysis of this nitrile with HCl in dioxane at room temperature gave I (R = PhCH<sub>2</sub>). Hydrogenolysis by shg gave p-PhCH<sub>2</sub>CH(NH<sub>2</sub>)CONH<sub>2</sub> (R = H). III was prepared by reaction of p-PhCH<sub>2</sub>CH(NH<sub>2</sub>)CONH<sub>2</sub> with ClCH<sub>2</sub>CH<sub>2</sub>OH (R<sub>1</sub> = CH<sub>2</sub>CH<sub>2</sub>OH) (12).

N#CC(N)COc1ccc(OCC2=CC=CC=C2)cc1

DOCUMENT TYPE: Journal  
LANGUAGE: English  
OTHER SOURCE(S): CASREACT 75:49523  
ABSTRACT:  
Racemic tetrazole analogs of N-benzoyloxycarbonyl derivs. of alanine, D-benzoylglycine, leucine, D-alanine and valine were resolved by means of L-tyrosine hydrazide. The resolution of tetrazole analog of N-benzoyloxycarbonyl-DL-phenylalanine provided the L-enantiomer. From the other fractionation experiments, the D-enantiomers of N-benzoyloxycarbonyl-D-alanine, D-benzoylserine, D-leucine, and D-valine were obtained.

N#CC1CN(C(=O)OCC2=CC=CC=C2)CC(SCC3=CC=CC=C3)C1

ABSTRACT: Cr. CA 60, 10781d, the title compounds, were prepared by dehydration of the amides of N-protected amino acids with POCl<sub>3</sub> in pyridine. The amino group was blocked either with the benzoyloxycarbonyl group (Z) or with the phthaloyl group (Pht). Thus, a solution of 1.38 g. 1-L-PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHZ)(CONH<sub>2</sub>) in 5.5 ml. dry pyridine was treated dropwise at -5° with POCl<sub>3</sub> in 1 ml. CH<sub>2</sub>Cl<sub>2</sub> and kept 30 min. in a cooling bath and 1.0 g. 1-L-PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHZ)(CONH<sub>2</sub>) in 5.5 ml. Me<sub>2</sub>CO, in either or CH<sub>2</sub>Cl<sub>2</sub> or ether. [α]<sub>D</sub><sup>20</sup> 88.1 (c 2.4, Me<sub>2</sub>CO). [α]<sub>D</sub><sup>20</sup> 93.0 (c 2.4, Me<sub>2</sub>CO). Similarly prepared were the following (compound, m.p., [α]<sub>D</sub><sup>20</sup> 93.0, and % yield given): ZNHC<sub>2</sub>H<sub>4</sub>CH<sub>2</sub>, 61-2°, -88; 1-L-Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHZ)CN, -20; 1-L-Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHZ)CN, 111-112°, -89; 1-111-122°, -89; 1-131-2°, -89; 1-L-Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)CN, 139-140°, -83; 1-L-PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)CN, 135-6°, -86; 1-L-PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)CN, 139-140°, -101° (c 1.0, CH<sub>2</sub>Cl<sub>2</sub>), 84; PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>, 153-4°, -73; 1-L-Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)CN, 67-69°, -89; PH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>, 130-32°, -86; 1-L-Me<sub>2</sub>CH<sub>2</sub>(NHPh)CO<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>, 90-91°, -75; 1-L-PH<sub>2</sub>CH<sub>2</sub>(NHPh)CO<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>, 116-117°, -84. was also prepared in 82% yield from H<sub>2</sub>NCO<sub>2</sub>CH<sub>2</sub>(NHZ)CONH<sub>2</sub> as described above, using warm dimethylformamide as a cosolvent and by repeating the dehydration with POCl<sub>3</sub> twice. A warm solution of 817 mg. Ph<sub>2</sub>NHC<sub>2</sub>CH<sub>2</sub>CONH<sub>2</sub> in 6 ml. pyridine was treated dropwise with 1 ml. POCl<sub>3</sub> in CH<sub>2</sub>Cl<sub>2</sub> refluxed 15 min. and diluted with ice-water to precipitate 477 mg. Ph<sub>2</sub>NHC<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub> (alc.). A solution of 5 g. Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)COOH and 3 ml. NEt<sub>3</sub> in 30 ml. dioxane was treated at -5° with 2 ml. ClCO<sub>2</sub>Et, kept in a cooling bath for 15 min., then NEt<sub>3</sub> in CH<sub>2</sub>Cl<sub>2</sub> added, the whole left at room temperature 15 min., and the mixture concentrated and the organic solvent in vacuo gave 3.59 g. Me<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>(NHPh)CO<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub> (Pht), 178-9° (PhtH).

O=C(NC(C#N)CSPh)OCC1=CC=CC=C1

IT 97255-68-OP, Hydrocinnamide,  $\alpha$ -benzamido-N-[2-(benzyloxy)-  
1-cyanoethyl]-  
RL: PREP (Preparation)  
(preparation of)  
RN 97255-68-O CAPLUS  
CN 97255-68-OP, Hydrocinnamide,  $\alpha$ -benzamido-N-[2-(benzyloxy)-1-cyanoethyl]- (7CI)  
(CA INDEX NAME)

$$\text{Ph}-\text{CH}_2-\text{O}-\text{CH}_2-\underset{\text{CN}}{\text{CH}}-\text{NH}-\underset{\text{O}}{\text{C}}-\underset{\text{NH}-\overset{\text{O}}{\text{C}}-\text{Ph}}{\text{CH}}-\text{CH}_2-\text{Ph}$$

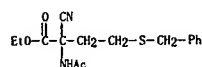
L4 ANSWER 78 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 1954:11227 CAPLUS  
 DOCUMENT NUMBER: 48:11227  
 ORIGINAL REFERENCE NO.: 48:2090a-c  
 TITLE: S-Benzylhomocysteine  
 INVENTOR(S): Tatsuo, S.; Nakamori, Ritsuo  
 PATENT ASSIGNEE(S): Takeda Pharmaceutical Industries Co.  
 DOCUMENT TYPE: Patent  
 LANGUAGE: Unavailable  
 FAMILY ACC. NUM. COUNT: 1  
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 27002778	B4	19520725	JP	

ABSTRACT:  
 EtONa (1.2 g, Na and 25 ml. alc.) and 8.5 g. AcNHCH(CN)CO<sub>2</sub>Et treated dropwise with 10.2 g. PhCH<sub>2</sub>SCH<sub>2</sub>CH<sub>2</sub>Cl, heated 15 hrs. on a water bath, the product poured into ice water, and the precipitate filtered and washed with water gave 9.6 g. PhCH<sub>2</sub>SCH<sub>2</sub>CH<sub>2</sub>CH<sub>2</sub>CO<sub>2</sub>Et (CN)CO<sub>2</sub>Et (1), m. 110-12° (from alc.); 1 and 200 ml. 15% HCl boiled on an oil bath 10 hrs., the product filtered with C, the filtrate concentrated in vacuo, the residue neutralized with C<sub>5</sub>H<sub>5</sub>SN, and the precipitate filtered, and washed with water and alc. give 41.2 g. PhCH<sub>2</sub>SCH<sub>2</sub>CH<sub>2</sub>(NH<sub>2</sub>)CO<sub>2</sub>H, m. 243° (decomposition) (from water).

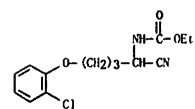
IT 854429-41-7P, Butyric acid, 2-acetamido-4-(benzylthio)-2-cyano-, ethyl ester  
 RL: PREP (Preparation)  
 (preparation of)  
 RN 854429-41-7 CAPLUS  
 CN Butyric acid, 2-acetamido-4-(benzylthio)-2-cyano-, ethyl ester (SCI) (CA INDEX NAME)



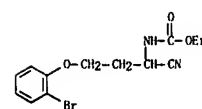
L4 ANSWER 79 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)

RCH(CN)CONHNH<sub>2</sub>, Carbamates RCH(R')NHCO<sub>2</sub>R', Phenylureido deriv. of amino acid  
 RCHNH<sub>2</sub>CO<sub>2</sub>H; R, M. p. (° C.), R', M. p. (° C.):  
 o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 87-8, CN CO<sub>2</sub>H, Et Et, 46-7 89-90, 169-71;  
 o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 99-100, CN CO<sub>2</sub>H, Et Et PhCH<sub>2</sub>, 67-8 101-2 84-5,  
 178-80; o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 113-14, CN, PhCH<sub>2</sub>, 90-2, 184-6; o-2NC  
 6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 112-13, CN CO<sub>2</sub>H, Et Et, 66 123-4, 163-5; m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 120, CN,  
 Et, 108, 174-6b; p-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 127-8, CN CN, Et PhCH<sub>2</sub>, 62-3 75-6, 190-2;  
 o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 89-9, CN, C<sub>2</sub>H<sub>5</sub>Et, 69, 167-9; o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>,  
 95-6, CN, Et, 75, 147-8a; o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 97-8, CN CN, Et PhCH<sub>2</sub>, 74  
 91-2, 157-8a; m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 101-2, CN, PhCH<sub>2</sub>, 83-4; a p-tolylsulfonamido  
 deriv.; b Hydanotin deriv. m. 157-8°.

IT 408537-19-9P, Carbamic acid, [4-(o-chlorophenoxy)-1-cyanobutyl]-, ethyl ester 854882-03-4P, Carbamic acid, [3-(o-bromophenoxy)-1-cyanopropyl]-, ethyl ester 854885-55-5P, Carbamic acid, [3-(o-chlorophenoxy)-1-cyanopropyl]-, ethyl ester 855687-96-6P, Carbamic acid, [1-cyano-4-(o-iodophenoxy)butyl]-, benzyl ester 855688-66-3P, Carbamic acid, [1-cyano-3-(m-nitrophenoxy)propyl]-, benzyl ester 876511-36-3P, Carbamic acid, [1-cyano-4-(o-nitrophenoxy)butyl]-, ethyl ester 876511-37-4P, Carbamic acid, [1-cyano-4-(m-nitrophenoxy)butyl]-, ethyl ester  
 RL: PREP (Preparation)  
 (preparation of)  
 RN 408537-19-9 CAPLUS  
 CN Carbamic acid, [4-(2-chlorophenoxy)-1-cyanobutyl]-, ethyl ester (9CI) (CA INDEX NAME)



RN 854882-03-4 CAPLUS  
 CN Carbamic acid, [3-(o-bromophenoxy)-1-cyanopropyl]-, ethyl ester (5CI) (CA INDEX NAME)



RN 854885-55-5 CAPLUS  
 CN Carbamic acid, [3-(o-chlorophenoxy)-1-cyanopropyl]-, ethyl ester (5CI) (CA INDEX NAME)

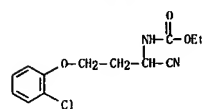
L4 ANSWER 79 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN

ACCESSION NUMBER: 1954:782 CAPLUS  
 DOCUMENT NUMBER: 48:782  
 ORIGINAL REFERENCE NO.: 48:1231, 124a-1  
 TITLE: Synthesis of α-amino acids from ethyl cyanoacetate  
 AUTHOR(S): Gagnon, Paul E.; Nadeau, Guy; Cote, Raymond  
 CORPORATE SOURCE: Laval Univ., QC  
 SOURCE: Canadian Journal of Chemistry (1952), 30, 592-7  
 CODEN: CJCHAG; ISSN: 0008-4042

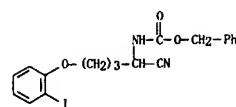
DOCUMENT TYPE: Journal  
 LANGUAGE: Unavailable  
 OTHER SOURCE(S): CASREACT 48:782  
 GRAPHIC IMAGE: For diagram(s), see printed CA issue.

ABSTRACT:  
 Monosubstituted cyanoacetic esters obtained by condensation of substituted bromophenoxyethanes and propanes with CH<sub>2</sub>(CN)CO<sub>2</sub>Et (I) in presence of K<sub>2</sub>CO<sub>3</sub> were transformed through a Curtius degradation into cyanoacetisocyanates which were hydrolyzed in either acid or alkaline medium to α-amino acids. Hydrolysis of the corresponding N-carbobenzoyloxy- or N-carbomethoxycyanonitriles afforded better yields. Mixts. containing 1 mole 1,3-C<sub>3</sub>H<sub>6</sub>Br<sub>2</sub>, 0.5 mole substituted phenol, 0.5 mole NaOH, and 400 ml. H<sub>2</sub>O were heated under reflux with stirring until neutral, 0.15-0.20 moles NaOH added and refluxing continued until neutral, dried, and fractionally distilled to give the 3-phenoxy-1-propyl bromide. 2-Phenoxyethyl bromides were prepared similarly from (CH<sub>2</sub>Br)<sub>2</sub>, Anhydrous K<sub>2</sub>CO<sub>3</sub> (0.12 mole.) Comp., B. p. (° C.)/mm. Hg, M. p. (° C.), Yield %, n<sub>D</sub><sup>20</sup>:  
 o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 118-20/5, -, 68-70, 1.555; o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 110-15/1-2, -, 73-5, 1.575; o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 150-2/3, 21-2, 80-2, 1.611; o-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 138-40/1, 37-8, 58-60, -;  
 m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 143-8/1, -, 72-4, -; p-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>Br, 175-7/2, 58-9, 67-9, -; o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>Br, 138-40/1-2, 10-11, 64-6, 1.565;  
 o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>Br, 110-11/1-2, 34-5, 72-4, -; o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>Br, 125-30/1-2, 48-9, 75-7, -; m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>Br, 140-5/1-2, 39-40, 70-2, -; was added to a solution of the bromide (0.10 mole) in 0.5 mole l, the mixture boiled 2.5-3 hrs. at 15-20 mm. pressure at 115-20° agitation being obtained by a fine stream of dry air (when the 2-phenoxyethyl bromide was used 10 g. CaSO<sub>4</sub> was added to the reaction mixts.) after cooling the mixts. were poured into 150 ml. water, extracted with Et<sub>2</sub>O, the exts. dried over Na<sub>2</sub>SO<sub>4</sub>, and distilled in vacuo to yield the monosubstituted ester, RCH(CN)CO<sub>2</sub>Et (see following table). The cyano- R, B. p. (° C.)/mm. Hg, M. p. (° C.), Yield %:  
 o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 128-33/0.05, 49-50, 89-91; o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 140-5/0.05, 57-8, 87-91; o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 150-3/0.05, 38-9, 89-92;  
 o-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 175-80/0.05, 76, 81-5; m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 160-5/0.05, 64, 78-81; p-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>3</sub>, 185-90/0.05, 60, 75-80; o-ClC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 118-23/0.05, 34-5, 75-80; o-BrC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 130-5/0.05, 28-9, 77-80;  
 o-IC<sub>6</sub>H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 135-40/0.05, 36-7, 77-80; m-2NC6H<sub>4</sub>O(CH<sub>2</sub>)<sub>2</sub>, 190-5/1-2, 64, 61-5; a From EtOH, acetic ester (0.1 mole) fused and slightly cooled, were mixed with 5 ml. 100% N<sub>2</sub>H<sub>4</sub>, H<sub>2</sub>O and 2-3 ml. EtOH, the mixture placed in an evacuated desiccator, the solid products formed were triturated with Et<sub>2</sub>O and water to yield, after recrystn. from H<sub>2</sub>O-EtOH, 80-90% of the hydrazides RCH(CN)CONHNH<sub>2</sub>. These were dissolved in 2N HCl, diazotized in the usual way, the azides extracted with Et<sub>2</sub>O or CHCl<sub>3</sub>, the exts. washed with water and dried over Na<sub>2</sub>SO<sub>4</sub>. The cyanoacetisocyanates were obtained by heating the azides in the presence of PhMe or immediately transformed into the carbamates in the presence of PhCH<sub>2</sub>OH or EtOH. When purified by washing with 5% NaOH and water the carbamates could be recrystd. from Et<sub>2</sub>O-petr. ether (65-100°). Hydrolysis of the nitrile group in hot alc. solution with dry HCl followed by mild alkaline treatment gave the carboxylic amino acids. Hydrolysis of the carbamates or cyanoacetisocyanates with HCl at the b. p. or under pressure give 60-75% of the corresponding amino acid. The cyanoacetylhydrazides and carbamates which were prepared are listed in the following table. Cyanoacetylhydrazides

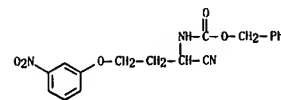
L4 ANSWER 79 OF 82 CAPLUS COPYRIGHT 2008 ACS ON STN (Continued)



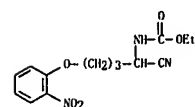
RN 855687-96-6 CAPLUS  
 CN Carbamic acid, [1-cyano-4-(o-iodophenoxy)butyl]-, benzyl ester (5CI) (CA INDEX NAME)



RN 855688-66-3 CAPLUS  
 CN Carbamic acid, [1-cyano-3-(m-nitrophenoxy)propyl]-, benzyl ester (5CI) (CA INDEX NAME)



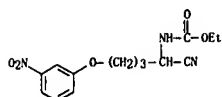
RN 876511-36-3 CAPLUS  
 CN Carbamic acid, [1-cyano-4-(o-nitrophenoxy)butyl]-, ethyl ester (5CI) (CA INDEX NAME)



RN 876511-37-4 CAPLUS  
 CN Carbamic acid, [1-cyano-4-(m-nitrophenoxy)butyl]-, ethyl ester (5CI) (CA INDEX NAME)



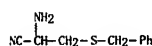
L4 ANSWER 79 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)



L4 ANSWER 80 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1953:31762 CAPLUS  
DOCUMENT NUMBER: 47:31762  
ORIGINAL REFERENCE NO.: 47:5353-g  
TITLE: A simple synthesis of DL-cystine from acrylonitrile  
AUTHOR(S): Gundermann, Karl Dietrich; Michael, Fritz  
CORPORATE SOURCE: Univ. Munster, Germany  
SOURCE: Ann. (1952), 578, 45-8  
DOCUMENT TYPE: Journal  
LANGUAGE: Unavailable  
OTHER SOURCE(S): CASREACT 47:31762  
ABSTRACT: To 35 g. freshly distilled PhCH2SH was added 0.6 g. dry NaOMe (free from MeOH) cooled to 0°, and, with stirring, 32 g. CH2=CClCN [C.A. 43, 2574d] at such a rate that the temperature never rose above 40°, the mixture cooled to 0°, then heated 1 hr. on the steam bath, neutralized with MeONa in MeOH, filtered, and fractionated in vacuo, giving 39.3 g. PhCH2SCH2CHClCN (I), b.p. 121-2°/m. 43-45°, and a by-product (not analyzed but possibly PhCH2SCH2CHCN). b.p. 101-5°/m. 96-8°, 1 (10.15 g.) with liquid NH3 gave 5.4 g. crude PhCH2SCH2CH(NH2)CN, which, without purification, was hydrolyzed with 50 cc. concentrated HCl, yielding 4.23 g. DL-PhCH2SCH2CH(NH2)CO2H (II), m. 209-13° (decomposition), purified by solution in 10% NaOH, precipitation with 25% AcOH, and crystallization from H2O. 1 (6.5 g.) mixed with 5.66 g. powdered o-C6H4(CO)2NH2-CN CH2SCH2Ph (III), m. 97-8°, b.p. 0.1 228°, 1.46 g. of which, saponified by the Wood-du Vigneaud method (C.A. 34, 82.2) gave 0.39 g. I and 0.29 g. III. I in liquid NH3 with Na, followed by oxidation (cf. W. and du V.) gave DL-cystine.

IT 408352-79-4P, Propionitrile, 2-amino-3-(benzylthio)-  
RL: PREP (Preparation)  
(preparation of)  
RN 408352-79-4 CAPLUS  
CN Propanenitrile, 2-amino-3-[(phenylmethyl)thio]- (CA INDEX NAME)

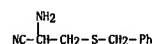


L4 ANSWER 81 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1950:12534 CAPLUS  
DOCUMENT NUMBER: 44:12534  
ORIGINAL REFERENCE NO.: 44:2476c-f  
TITLE: Synthesis of S-benzyl-L-cysteine  
AUTHOR(S): Gawron, Oscar; Glaid, Andrew J., III.  
CORPORATE SOURCE: Duquesne Univ., Pittsburgh, PA  
SOURCE: Journal of the American Chemical Society (1949), 71, 3232-3  
CODEN: JACSAT; ISSN: 0002-7863  
DOCUMENT TYPE: Journal  
LANGUAGE: Unavailable

ABSTRACT: EtOH (500 ml.), treated with 23 g. Na and then with 124 g. PhCH2SH and, after cooling, with 169 g. BrCH2CH(OMe)2 and refluxed 3 hrs., gives 70% (benzylmercapto)acetaldehyde di-Me acetal (I), b.p. 140-1°, d422 1.0757, nD22 1.5303; 110 g. I and 350 ml. N H2SO4, refluxed 1.5 hrs., give 75% PhCH2SCH2CHO (II), b.p. 125.5-7°, d422 1.1105, nD22 1.5699 (semicarbazone, m. 105-7°). II (35 g.), added slowly to 23 g. NaHSO3, in 75 ml. H2O, shaken 10 min., treated portionwise with 11 g. NaCN in 30 ml. H2O, shaken 30 min., and extracted with C6H6, gives 85% crude PhCH2SCH2CH(OH)CN which, treated at 100° with NH3, gives 65% PhCH2SCH2CH(NH2)CN (III); heated 4 hrs. at 100° with 100 ml. concentrated HCl, 23 g. III yields 67.5% S-benzyl-L-cysteine (IV), m. 213-14° (20 g.), 57 g. (NH4)2CO3, 12.7 g. NaCN, and 340 ml. 50% EtOH, heated 4 hrs. at 40-5° give 70% 5-(benzylmercaptoethyl)hydantoin, m. 118-19°; hydrolysis resulted in decomposition without yielding IV.

IT 408352-79-4P, Propionitrile, 2-amino-3-(benzylthio)-  
RL: PREP (Preparation)  
(preparation of)  
RN 408352-79-4 CAPLUS  
CN Propanenitrile, 2-amino-3-[(phenylmethyl)thio]- (CA INDEX NAME)



L4 ANSWER 82 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1948:13659 CAPLUS  
DOCUMENT NUMBER: 42:13659  
ORIGINAL REFERENCE NO.: 42:2931a-i, 2932a-b  
TITLE: Synthesis of some amino acids, including methionine  
AUTHOR(S): Catch, J. R.; Cook, A. H.; Graham, A. R.; Heilbron, Ian  
CORPORATE SOURCE: Imp. Coll. Sci. Technol., London, UK  
SOURCE: Journal of the Chemical Society (1947) 1609-13  
CODEN: JCSOA9; ISSN: 0368-1769  
DOCUMENT TYPE: Journal  
LANGUAGE: Unavailable  
OTHER SOURCE(S): CASREACT 42:13659  
GRAPHIC IMAGE: For diagram(s), see printed CA issue.

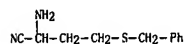
ABSTRACT: cf. C.A. 41, 4774i. CH2=CHCHO (I) (5.6 g.) and 7.6 g. AcSH, mixed at 0° and kept overnight, give 68% β-(acetylmercapto)propionaldehyde, b.p. 92-3°, nD18 1.4943 (2,4-dinitrophenylhydrazone, yellow, m. 127.5°); 21 g. MeCH=CHCHO (II) and 22.5 g. AcSH give 65% β-(acetylmercapto)butyraldehyde, b.p. 91-2°, nD14 1.4882 (2,4-dinitrophenylhydrazone, yellow, m. 96°); 8 g. Me2C=CHCHO (III) and 8 g. AcSH give 33% β-(acetylmercapto)-β-methylbutyraldehyde, b.p. 110°, nD20 1.4922 (2,4-dinitrophenylhydrazone, yellow, m. 94°). I (20 g.) containing 2 drops Et3N at 0°, treated with MeSH, gives 86% MeSCH2CH2CHO (IV), b.p. 150-166° (2,4-dinitrophenylhydrazone, yellowish orange, m. 122-3°); EtSH gives 62% EtSCH2CH2CHO (V), b.p. 160-185° (2,4-dinitrophenylhydrazone, orange-red, m. 100°). I (5.6 g.) at 0°, treated with 12.4 g. PhCH2SH and a drop of piperidine and the mixture kept 15 min. at 0° and 1 h. at room temperature, gives 83% β-(benzylmercapto)propionaldehyde (VI), b.p. 158°, nD19 1.5650 (2,4-dinitrophenylhydrazone, yellow, m. 112.5°); 28 g. II and 50 cc. PhCH2SH, mixed at 0°, a drop of piperidine added, and the mixture kept 3 h. at room temperature and heated 1 h. on the steam bath, give 87% β-(benzylmercapto)butyraldehyde (VII), b.p. 156-7°, nD20 1.5523 (2,4-dinitrophenylhydrazone, yellow, m. 69°); III and PhCH2SH containing piperidine, heated 3 h. on the steam bath, gives 56% β-(benzylmercapto)isovaleraldehyde (VIII), b.p. 109-10°, b.p. 172°, nD15 1.5484 (2,4-dinitrophenylhydrazone, m. 113°). VI (1.2 g.) and 1 cc. HCN at 0°, treated with a drop of piperidine, ether-HCl added after 0.5 h., the HCN removed in vacuo, 3 cc. EtOH-NH3 added, and the solution (sealed tube) kept overnight at room temperature and heated 0.5 h. at 100°, give 55% α-amino-γ-(benzylmercapto)butyronitrile-HCl (VIIIa), m. 134-5°; VI gives 68% α-amino-γ-(benzylmercapto)valeronitrile-HCl (VIIIb), m. 159° (decomposition), and VIII yields 27% of the γ-Me derivative, m. 156-7°, VII (15 g.), 15 g. AcOH, 5.5 g. NH2OH.HCl, and 100 cc. EtOH, refluxed 30 min., and 5 g. of oily oxime (5 g.) in 150 cc. moist ether, refluxed overnight with 4 g. Al-Hg, give 2 g. 3-(benzylmercapto)butylamine, b.p. 190-2°, nD20 1.5545 (HCl salt, m. 123°); VIII similarly yields 25% 3-(benzylmercapto)-3-methylbutylamine, b.p. 102-4°, nD20 1.5521 (HCl salt, m. 157°). IV (6.3 g.) treated with 5 cc. anhydrous HCN and 100 mg. KCN and the reaction product heated 2 h. at 80° with 40 cc. 10% EtOH-NH3 give 65% α-amino-γ-(benzylmercapto)butyronitrile (IX), analyzed as the oxalate, with 0.5 mol. EtOH, m. 200° (decomposition). V (10 g.) gives 3.5 g. α-amino-γ-(ethylmercapto)butyronitrile oxalate (X), m. 230° (decomposition). IX, refluxed 1.5 h. with 10 cc. concentrated HCl, gives 52% methionine (XI); X gives 46%. IX, refluxed 2 h. with 50% EtOH-CS2, gives 47% 5-(2-methylmercaptoethyl)diethoxyhydantoin (XII), yellow, m. 212° (decomposition); If the reaction is carried out in the presence of BzH, there results 5-benzylidenemethyl-2-mercapto-4-(2-methylmercaptoethyl)thiazole (XIII), yellow, m. 200° (decomposition); X yields 40% 5-[2-(ethylmercapto)-ethyl]diethoxyhydantoin, yellow, m. 196-7° (decomposition). XII or XIII, refluxed with a mixture of AcOH and concentrated HCl, gives 25% XI. The over-all yield of XI from I is 29%. VIIIa (860 mg.) and 17.5 cc. 47% HBr, heated 3.5 h. at 100°, give 60% S-benzylhomocysteine, m. 190-1°, VIIIb (257 mg.)

L4 ANSWER 82 OF 82 CAPLUS COPYRIGHT 2008 ACS on STN (Continued)  
 and 3 cc. concd. HCl, heated 16 h. at 100° give 110 mg.  
 $\alpha$ -amino- $\gamma$ -(benzylmercapto)-valeric acid, m. 215-16°  
 (decompn.). The free base from 3.8 g. VIIIB, refluxed 3 h. with 20 cc. 50%  
 EtOH-CS<sub>2</sub>, gives 70% 5-amino-2-mercapto-4-[2-  
 (benzylmercapto)isobutyl]thiazole (XIV), pale yellow, m. 237° with 50%  
 aq. (CHO)2 it yields the bisazomethine (XV), red, m. 238°. XIV (5 g.)  
 refluxed 2 h. with 40 cc. 50% AcOH-concd. HCl, gives 59%  $\alpha$ -amino- $\gamma$ -  
 (benzylmercapto)- $\gamma$ -methylvaleric acid (XVI), m. 178° with Na in  
 liq. NH<sub>3</sub> XVI yields 73%  $\alpha$ -amino- $\gamma$ -mercapto- $\gamma$ -methylvaleric  
 acid (XVII), Me<sub>2</sub>C(SH)CH<sub>2</sub>CH(NH<sub>2</sub>)CO<sub>2</sub>H, m. 219° (decompn.). XVII (250 mg.  
 of the HCl salt), 1 cc. BzH, and 2 cc. MeOH-HCl, heated 15 min. on the steam  
 bath, give 4-carbomethoxy-2-phenyl-6,6-dimethyl- $\pi$ -thiazane, m. 105°.

IT 855621-15-7P, Butyronitrile, 2-amino-4-(benzylthio)-,  
 hydrochloride  
 RL: PREP (Preparation)  
 (preparation of)

RN 855621-15-7 CAPLUS

CN Butyronitrile, 2-amino-4-(benzylthio)-, hydrochloride (5C1) (CA INDEX  
 NAME)



● HCl

10/518,210

Page 111

=> log h

COST IN U.S. DOLLARS

SINCE FILE  
ENTRY

TOTAL  
SESSION

FULL ESTIMATED COST

449.78

628.35

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE  
ENTRY

TOTAL  
SESSION

CA SUBSCRIBER PRICE

-65.60

-65.60

SESSION WILL BE HELD FOR 120 MINUTES

STN INTERNATIONAL SESSION SUSPENDED AT 11:13:32 ON 28 JAN 2008